



Floodplain Development Permit

Doddridge County, WV Floodplain Management

This permit gives approval for the development/ project listed that impacts the FEMA-designated floodplain and/or floodway of Doddridge County, WV, pursuant to the rules and regulations established by all applicable Federal, State and local laws and ordinances, including the Doddridge County Floodplain Ordinance. This permit must be posted at the site of work as to be clearly visible, and must remain posted during entirety of development.

Permit: #16-412 EXTENSION
MOSA-DOO2, MOSA-S036, MOSA-D003, MOSA-A033

Date Approved: March 21, 2017

Expires: June 19, 2017

Issued to: EQM Gathering OpCo, LLC

POC: Stephanie Frazier
412-553-5798

Company Address: 625 Liberty Avenue, Suite 1700
Pittsburgh, PA 15222

Project Address: Arnolds Creek and South Fork Hughes River Area

Firm:

Lat/Long:

Purpose of development: Pipeline

Issued by: George C. Eidel, CFM, OEM Director/Doddridge County FPM (or designee)

Date: March 21, 2017

For additional information regarding this permit, please contact
Doddridge County Floodplain Manager at 304.873.2631, or via email at
doddridgecountyfpm@gmail.com
118 East Court Street; West Union, WV 26456

Floodplain Development Permit

Doddridge County, WV Floodplain Management

This permit gives approval for the development/ project listed that impacts the FEMA-designated floodplain and/or floodway of Doddridge County, WV, pursuant to the rules and regulations established by all applicable Federal, State and local laws and ordinances, including the Doddridge County Floodplain Ordinance. This permit must be posted at the site of work as to be clearly visible, and must remain posted during entirety of development.

Permit: #16-412

West Union

Date Approved: 03/21/2016



Expires: 03/21/2017

Issued to: EQM Gathering

POC: Matthew Bagaley - 412-921-4030

OpCo, LLC - MOSA-D002, MOSA-S036, MOSA-D003 & MOSA-A033

**Company Address: 625 Liberty Av., Suite 1700
Pittsburgh, PA 15222**

Project Address: Arnolds Creek and South Fork Hughes River Area

Firm: Lat/Long:

Purpose of development: Pipeline

Issued by: George C Eidel, Doddridge County FPM (or designee)

Date: 03/21/2016

For additional information regarding this permit, please contact
Doddridge County Floodplain Manager at 304.873.2631, or via email at
doddridgecountyfpm@gmail.com

108 Court Street Ste 1; West Union, WV 26456

THE GATEWAY ENGINEERS, INC.

140044

DATE	INVOICE NO.	COMMENT	AMOUNT	NET AMOUNT
01/15/2016	2016-01/15	Application Fee C-18422-0011 #16-412 C EQM Gathering OPCO, LLC MOSA S633 Pipeline		4,000.00
DATE 01/15/16		VENDOR Doddridge County	TOTAL	4,000.00

140044

THE GATEWAY ENGINEERS, INC.

400 HOLIDAY DRIVE, SUITE 300
PITTSBURGH, PA 15220-2727
(412) 921-4030

PNC Bank, N.A.
Pittsburgh, PA

8-9/430

Four Thousand and no/100

DATE

AMOUNT

01/15/16

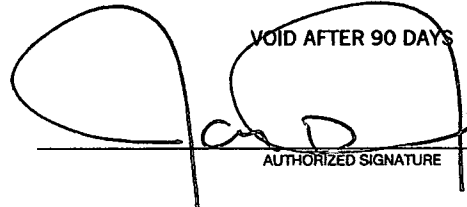
140044

\$4,000.00

PAY
TO THE
ORDER
OF

DODDRIDGE COUNTY
ATTN.: GEORGE EIDEL
118 EAST COURT STREET
WEST UNION WV 26456

VOID AFTER 90 DAYS


AUTHORIZED SIGNATURE

Security features. Details on back.

⑈ 140044 ⑈ ⑆ 043000096 ⑆ 1028945297 ⑈

THE GATEWAY ENGINEERS, INC.

140046

DATE	INVOICE NO.	COMMENT	AMOUNT	NET AMOUNT
01/15/2016	2016-01/15B	Application Fee C-18422-0010		775.00
DATE 01/15/16	VENDOR Doddridge County		TOTAL	775.00

140046

THE GATEWAY ENGINEERS, INC.
400 HOLIDAY DRIVE, SUITE 300
PITTSBURGH, PA 15220-2727
(412) 921-4030

PNC Bank, N.A.
Pittsburgh, PA
8-9/430

Seven Hundred Seventy Five and no/100

DATE

AMOUNT

01/15/16

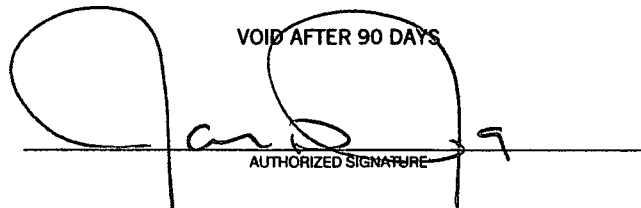
140046

\$775.00

PAY
TO THE
ORDER
OF

**DODDRIDGE COUNTY
ATTN.: GEORGE EIDEL
118 EAST COURT STREET
WEST UNION WV 26456**

VOID AFTER 90 DAYS



AUTHORIZED SIGNATURE

Security features. Details on back.

⑈ 140046 ⑈ ⑆043000096⑆ 1028945297⑈

THE GATEWAY ENGINEERS, INC.

140045

DATE	INVOICE NO.	COMMENT	AMOUNT	NET AMOUNT
01/15/2016	2016-01/15A	Application Fee C-18422-0010 #16-412 B EQM Gathering, OTCO, LLC MOSA D003 and MOSA S036 Pipeline		4,250.00
DATE 01/15/16		VENDOR Doddridge County	TOTAL	4,250.00

140045

THE GATEWAY ENGINEERS, INC.

400 HOLIDAY DRIVE, SUITE 300
PITTSBURGH, PA 15220-2727
(412) 921-4030

PNC Bank, N.A.
Pittsburgh, PA

8-9/430

Four Thousand Two Hundred Fifty and no/100

DATE

AMOUNT

01/15/16


140045

\$4,250.00

PAY
TO THE
ORDER
OF

DODDRIDGE COUNTY
ATTN.: GEORGE EIDEL
118 EAST COURT STREET
WEST UNION WV 26456

VOID AFTER 90 DAYS



AUTHORIZED SIGNATURE

Security features. Details on back.

⑈ 140045 ⑈ ⑆043000096⑆ 1028945297⑈

THE GATEWAY ENGINEERS, INC.

140561

DATE	INVOICE NO.	COMMENT	AMOUNT	NET AMOUNT
04/22/2016	2016-04/22	Fee for floodplain application C-18422-0011 <i>COPY</i> <i>#16-412</i>		1,000.00
DATE 04/22/16			VENDOR	Doddridge County
			TOTAL	1,000.00

APR 26 16 2:46 PM

140561

THE GATEWAY ENGINEERS, INC.

400 HOLIDAY DRIVE, SUITE 300
PITTSBURGH, PA 15220-2727
(412) 921-4030

PNC Bank, N.A.
Pittsburgh, PA

8-9/430

One Thousand and no/100

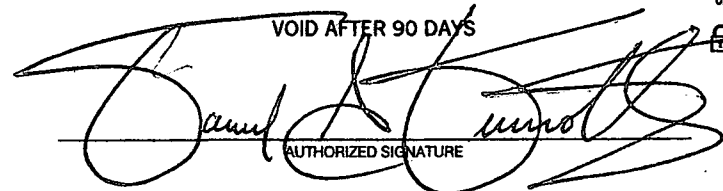
DATE AMOUNT

04/22/16 140561 \$1,000.00

PAY
TO THE
ORDER
OF

DODDRIDGE COUNTY
ATTN.: GEORGE EIDEL
118 EAST COURT STREET
WEST UNION WV 26456

VOID AFTER 90 DAYS



AUTHORIZED SIGNATURE

Security features. Details on back.

⑈ 140561 ⑈ ⑆043000096⑆ ⑆028945297⑈

Doddridge County, West Virginia

RECEIPT NO: 6420

DATE: 2016/02/08

FROM: THE GATEWAY ENGINEERS INC

AMOUNT: \$ 4,000.00

FOUR THOUSAND DOLLARS AND 00 CENTS

FOR: #16-412-C EQM GATHERING OPCO, LLC
MOSA 5033 PIPELINE

00000140044 FP-BUILDING PERMITS

020-318

TOTAL: \$4,000.00

MICHAEL HEADLEY

SHERIFF & TREASURER

MEC

CLERK

Customer Copy

THE GATEWAY ENGINEERS, INC.

140044

DATE	INVOICE NO.	COMMENT	AMOUNT	NET AMOUNT
01/15/2016	2016-01/15	Application Fee C-18422-0011 #16-412-C EQM Gathering OPCO, LLC MOSA 5033 Pipeline		4,000.00
DATE 01/15/16	VENDOR Doddridge County		TOTAL	4,000.00

Doddridge County, West Virginia

RECEIPT NO: 6418

DATE: 2016/02/08

FROM: THE GATEWAY ENGINEERS INC

AMOUNT: \$ 775.00

SEVEN HUNDRED SEVENTY FIVE DOLLARS AND 00 CENTS

FOR: #16-412-A EQM GATHERING OPCO LLC
PIPELINE (MOSA DOO2)

00000140046 FP-BUILDING PERMITS

020-318

TOTAL: \$775.00

MICHAEL HEADLEY
SHERIFF & TREASURER

MEC
CLERK

Customer Copy

THE GATEWAY ENGINEERS, INC.

140046

DATE	INVOICE NO.	COMMENT	AMOUNT	NET AMOUNT
01/15/2016	2016-01/15B	Application Fee C-18422-0010 # 16-412 - A EQM Gathering OPCO, LLC, Pipeline (MOSA DOO2)		775.00
DATE 01/15/16	VENDOR Doddridge County		TOTAL	775.00

Doddridge County, West Virginia

RECEIPT NO: 6419

DATE: 2016/02/08

FROM: THE GATEWAY ENGINEERS INC AMOUNT: \$ 4,250.00

FOUR THOUSAND TWO HUNDRED FIFTY DOLLARS AND 00 CENTS

FOR: #16-412-B EQM GATHERING OPCO, LLC
MOSA D003 AND MOSA 5036 PIPELINE

00000140045 FP-BUILDING PERMITS

020-318

TOTAL: \$4,250.00

MICHAEL HEADLEY

SHERIFF & TREASURER

MEC

CLERK

Customer Copy

THE GATEWAY ENGINEERS, INC.

140045

DATE	INVOICE NO.	COMMENT	AMOUNT	NET AMOUNT
01/15/2016	2016-01/15A	Application Fee C-18422-0010 #16-412-B EQM Gathering OPCO, LLC MOSA D003 and MOSA 5036 Pipe line		4,250.00
DATE 01/15/16	VENDOR Doddridge County		TOTAL	4,250.00



west virginia department of environmental protection

Division of Water and Waste Management
601 57th Street SE
Charleston, West Virginia 25304-2345
Phone: 304-926-0495
Fax: 304-926-0496

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

March 04, 2016

MATTHEW HOOVER
EQM GATHERING OPCO, LLC
625 LIBERTY AVE
STE 1700
PITTSBURGH, PA 15222

Re: General Permit Registration No. WVR310636
MOSA D002 Pipeline, Doddridge County, Disturbed
Acres (38.2)

Dear Permittee:

Attached is a copy of your completed registration form for your activity with the above assigned registration number. You are now authorized to operate under General Permit No. WV0116815. This registration form should be kept with your copy of the General Permit. You should carefully read the contents of the permit and become familiar with all requirements needed to remain in compliance with the permit.

Although you should be aware of all the terms and conditions of this permit, we wish to advise you of the following important requirements:

1. In accordance with Section G.4 of the General Permit, you have developed a complete storm water pollution prevention plan. This plan is to be retained on site and be available for review by the Director or the Director's authorized representative as of the date of your coverage by the General Permit, which is the date of this letter.
2. The erosion control measures approved by this agency for this project shall be maintained in proper condition to individually and collectively perform the functions for which they were designed. In order to insure the efficiency and proper maintenance of these measures, the permittee shall make sufficiently frequent, periodic inspections to detect any impairment of the designed stability, capacity or environmental requirements of the approved measures. The permittee shall take immediate steps to correct any such impairment found to exist.
3. If this Stormwater Pollution Prevention Plan (SWPPP) proves to be ineffective in controlling erosion and the sediment in storm water discharges associated with industrial/construction activities, or site conditions change, the Permittee shall amend the SWPPP and install appropriate sediment and/or control devices in accordance with Section G.4.c) of this permit and the application instructions.
4. The current General Permit expires on May 13, 2018. If you wish to continue an activity regulated by this permit after the expiration date of the permit, provisions for coverage will be made during the public notice process for any new General Permit to be issued at that time.

MATTHEW HOOVER

Page 2

March 04, 2016

5. Final stabilization means disturbed areas shall be covered by the appropriate permanent protection. Final stabilization includes; pavement, buildings, stable waterways (riprap, concrete, grass or pipe), a healthy, vigorous stand of perennial grass that uniformly covers at least 70 percent of the ground, stable outlet channels with velocity dissipation which directs site runoff to a natural watercourse, and any other approved structure or material.

Your annual permit fee has been assessed as \$1,000.00. You will be invoiced by this agency one month prior to the anniversary date of your original approval date. Failure to submit the annual fee within ninety (90) days of the due date will render your permit void upon the date you are mailed a certified written notice to that effect. Please be advised that a pro-rated annual permit fee may be assessed upon the completion date and proper stabilization.

Issuance of this approval of the General Permit registration does not authorize any injury to persons or property or invasion of other private rights, or any infringement of federal, state or local law or rules.

The validity of this General Permit Registration is contingent upon payment of the applicable annual permit fee, as required by Chapter 22, Article 11, Section 10 of the Code of West Virginia.

Your efforts toward preventing the degradation of our natural resources are greatly appreciated. If you have any questions, please contact Sharon Mullins of this Office at (304) 926-0499 extension 1132 or at sharon.a.mullins@wv.gov.

Scott G. Mandirola

Director

WV DEP-Division of Water & Waste Mgt.

601 57th St SE

Charleston, WV 25304-2345

Phone: (304) 926-0495

Fax: (304) 926-0463



DIVISION OF NATURAL RESOURCES

324 Fourth Avenue, Room 200
South Charleston WV 25303-1228
TDD (304) 558-1439
TDD 1-800-354-6087
Fax (304) 558-6048
Telephone (304) 558-3225

Earl Ray Tomblin
Governor

Robert A. Fala
Director

January 8, 2016

RE: Stream Activity Application
P-15-VI/09-1749
LS-15-VI/09-1750

EQM Gathering OPCO, LLC
Matt Hoover
c/o The Gateway Engineers, Inc.
Attention: Matthew E. Bagaley
Pittsburgh, PA 15220-

Dear Mr. Hoover:

After reviewing your Stream Activity Application to perform work (MOSA D003/MOSA S036) along Arnold Creek near West Union in Doddridge County, we are referring you to the Division's Diversity Wildlife Biologist Janet Clayton. You will need to have a mussel survey performed before a permit may be issued by this office.

You may contact Janet Clayton at (304) 637-0245 to begin the mussel survey process.

Sincerely,

A handwritten signature in cursive script that reads "Carrie Brooks".

Carrie Brooks
WV DNR, Office of Land and Streams



DIVISION OF NATURAL RESOURCES

324 Fourth Avenue, Room 200
South Charleston WV 25303-1228
TDD (304) 558-1439
TDD 1-800-354-6087
Fax (304) 558-6048
Telephone (304) 558-3225

Earl Ray Tomblin
Governor

Robert A. Fala
Director

March 18, 2016

Division of Natural Resources
LICENSE AND RIGHT OF ENTRY

Re: P-15-VI/09-1749

EQM Gathering OPCO, LLC
Matt Hoover
c/o The Gateway Engineers, Inc.
Attention: Matthew E. Bagaley
400 Holiday Drive, Suite 300
Pittsburgh, PA 15220-

Dear Mr. Hoover:

The Division of Natural Resources hereby grants to you for a term of ten (10) years, from the date hereof, a License and Right of Entry to construct, replace, cover, repair, operate, maintain, use and remove a sixteen inch (16") steel pipeline at eleven (11) separate locations and a twenty inch (20") at two (2) separate locations (MOSA D003/MOSA S036) along unnamed tributaries of Right Fork Arnold Creek, Left Fork Arnold Creek, Pritchard Run, unnamed tributaries of Pritchard Run, Arnold Creek, and an unnamed tributary of Arnold Creek, near West Union in Doddridge County, West Virginia, as shown located and highlighted in red on the map attached hereto as Exhibit A.

This License and Right of Entry is subject to the following terms and conditions:

High Quality Streams (HQS) as listed in the West Virginia Division of Natural Resources High Quality Stream Sixth Edition published in 2001 and for any trout streams and direct tributaries of trout streams:

- Directional boring is the only method permitted during the fish spawning season. Fish spawning season for warmwater streams runs from April 1st through June 30th. Trout spawning season runs from October 1st through April 30th.
- Other dry ditch methods (pump around, flume or cofferdam) as described in WVDEP water resources manual (published 2006) on page 3.21-4 may be used outside of spawning seasons.
- Each crossing that utilizes dry ditch methods must be completed in 2 consecutive work days.

Non-high quality stream:

- Directional boring or other dry ditch methods (pump around, flume or cofferdam) as described in WVDEP water resources manual (published 2006) on page 3.21-4 may be used at all times during fish spawning season from April 1st through June 30th.

EQM Gathering OPCO, LLC
P-15-VI/09-1749
Page 2
March 18, 2016

This eliminates the need for spawning season restrictions.

- Crossings using methods other than directional boring. Must be completed in 1 work day.
- Only ephemeral/intermittent streams that are dry can be trenched.

Bank Stabilization

All bank stabilization projects must begin immediately upon completion of utility line crossing and be completed within 24 hours of completion of utility line crossing.

Freshwater Mussels

Mussel surveys on streams with known US Fish and Wildlife listed or candidate endangered species will be required if directional boring is not an option. Contact Janet Clayton of the WVDNR Wildlife Diversity Program for information concerning mussels at 304-637-0245.

For further assistance, contact the appropriate WVDNR District Fisheries Biologist.

District 1 304-825-6787 District 2 304-822-3551 District 3 304-924-6211
District 4 304-256-6947 District 5 304-675-0871 District 6 304-420-4550

The issuance of this License and Right of Entry by the Division of Natural Resources does not preclude the necessity to obtain a permit from the Corps of Engineers or any other state or federal permits which may be required by law, nor does this License and Right of Entry negate the need to comply with the West Virginia Water Pollution Control Act and/or the State Environmental Quality Board's administrative regulations, applicant is also responsible for determining if the proposed activity is located within an identified flood plain and it is the applicant's responsibility for contacting the local governmental agency in charge of that program and obtaining a flood plain development permit for it. This License and Right of Entry does not grant any rights or privileges, or permission to enter upon or to cross the property of any other person, nor is permission granted to remove any material that lies upon the property of any other persons. Work should be completed in as brief a period as possible and within one year from the date of this letter. In the event you fail or refuse to comply with any of the terms or conditions herein, this License and Right of Entry will be canceled and considered null and void and the Division will reject further applications.

Your check in the amount of \$3025.00 is now due and payable to the Division of Natural Resources covering the (10) ten-year fee of this agreement. Your agreement will be effective upon receipt of your payment in full.

Sincerely,



Joe T. Scarberry, Supervisor
Office of Land and Streams

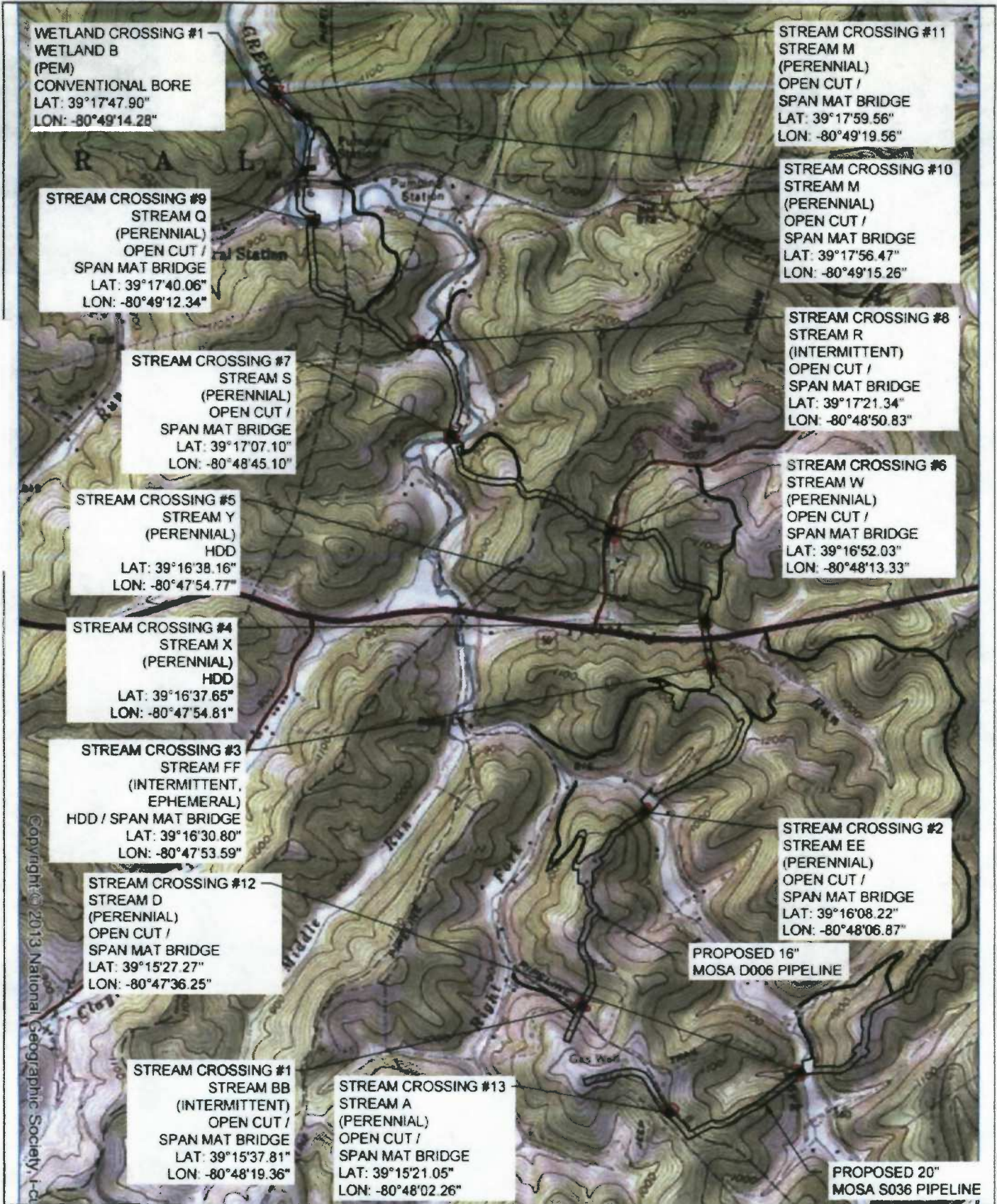
JTS:cb

attachment

pc: DNR Fish Biologist
Jeremy Bandy, Environmental Enforcement
DNR Conservation Officers

P-15-VII09-1749

Exhibit A



WETLAND CROSSING #1
WETLAND B
(PEM)
CONVENTIONAL BORE
LAT: 39°17'47.90"
LON: -80°49'14.28"

STREAM CROSSING #9
STREAM Q
(PERENNIAL)
OPEN CUT /
SPAN MAT BRIDGE
LAT: 39°17'40.06"
LON: -80°49'12.34"

STREAM CROSSING #7
STREAM S
(PERENNIAL)
OPEN CUT /
SPAN MAT BRIDGE
LAT: 39°17'07.10"
LON: -80°48'45.10"

STREAM CROSSING #5
STREAM Y
(PERENNIAL)
HDD
LAT: 39°16'38.16"
LON: -80°47'54.77"

STREAM CROSSING #4
STREAM X
(PERENNIAL)
HDD
LAT: 39°16'37.65"
LON: -80°47'54.81"

STREAM CROSSING #3
STREAM FF
(INTERMITTENT,
EPHEMERAL)
HDD / SPAN MAT BRIDGE
LAT: 39°16'30.80"
LON: -80°47'53.59"

STREAM CROSSING #12
STREAM D
(PERENNIAL)
OPEN CUT /
SPAN MAT BRIDGE
LAT: 39°15'27.27"
LON: -80°47'36.25"

STREAM CROSSING #1
STREAM BB
(INTERMITTENT)
OPEN CUT /
SPAN MAT BRIDGE
LAT: 39°15'37.81"
LON: -80°48'19.36"

STREAM CROSSING #13
STREAM A
(PERENNIAL)
OPEN CUT /
SPAN MAT BRIDGE
LAT: 39°15'21.05"
LON: -80°48'02.26"

STREAM CROSSING #11
STREAM M
(PERENNIAL)
OPEN CUT /
SPAN MAT BRIDGE
LAT: 39°17'59.56"
LON: -80°49'19.56"

STREAM CROSSING #10
STREAM M
(PERENNIAL)
OPEN CUT /
SPAN MAT BRIDGE
LAT: 39°17'56.47"
LON: -80°49'15.26"

STREAM CROSSING #8
STREAM R
(INTERMITTENT)
OPEN CUT /
SPAN MAT BRIDGE
LAT: 39°17'21.34"
LON: -80°48'50.83"

STREAM CROSSING #6
STREAM W
(PERENNIAL)
OPEN CUT /
SPAN MAT BRIDGE
LAT: 39°16'52.03"
LON: -80°48'13.33"

STREAM CROSSING #2
STREAM EE
(PERENNIAL)
OPEN CUT /
SPAN MAT BRIDGE
LAT: 39°16'08.22"
LON: -80°48'06.87"

PROPOSED 16"
MOSA D006 PIPELINE

PROPOSED 20"
MOSA S036 PIPELINE

Copyright © 2013 National Geographic Society, I-C

MOSA D003 / MOSA S036 PIPELINE DODDORIDGE, WEST VIRGINIA		<table border="1"> <thead> <tr> <th>Date</th> <th>No.</th> <th>REVISION RECORD</th> </tr> </thead> <tbody> <tr><td>-</td><td>01</td><td></td></tr> <tr><td>-</td><td>02</td><td></td></tr> <tr><td>-</td><td>03</td><td></td></tr> <tr><td>-</td><td>04</td><td></td></tr> <tr><td>-</td><td>05</td><td></td></tr> <tr><td>-</td><td>06</td><td></td></tr> <tr><td>-</td><td>07</td><td></td></tr> <tr><td>-</td><td>08</td><td></td></tr> </tbody> </table>		Date	No.	REVISION RECORD	-	01		-	02		-	03		-	04		-	05		-	06		-	07		-	08		<p>The Gateway Engineers, Inc. Full-Service Civil Engineering & Surveying Pittsburgh, PA gatewayengineers.com 855-634-6264</p>
Date	No.	REVISION RECORD																													
-	01																														
-	02																														
-	03																														
-	04																														
-	05																														
-	06																														
-	07																														
-	08																														
PREPARED FOR EQM GATHERING OPCO, LLC 825 LIBERTY AVENUE PITTSBURGH, PENNSYLVANIA 15222																															

FIG-2A



DIVISION OF NATURAL RESOURCES

324 Fourth Avenue, Room 200
South Charleston WV 25303-1228
TDD (304) 558-1439
TDD 1-800-354-6087
Fax (304) 558-6048
Telephone (304) 558-3225

Earl Ray Tomblin
Governor

Robert A. Fala
Director

March 18, 2016

Division of Natural Resources
RIGHT OF ENTRY

Re: **LS-15-VI/09-1750**

EQM Gathering OPCO, LLC
Matt Hoover
c/o The Gateway Engineers, Inc.
Attention: Matthew E. Bagaley
400 Holiday Drive, Suite 300
Pittsburgh, PA 15220-

Dear Mr. Hoover:

The Division of Natural Resources hereby grants to you for a period of ten (10) years from the date hereof, a Right of Entry to install, use and maintain a span mat bridge crossing (MOSA D003/MOSA S036) at twenty-two (22) separate locations along unnamed tributaries of Right Fork Arnold Creek, unnamed tributaries of Left Fork Arnold Creek, unnamed tributaries of Pritchard Run, Arnold Creek, unnamed tributaries of Arnold Creek, and an unnamed tributary of Brushy Fork near West Union in Doddridge County, West Virginia.

This Right of Entry is subject to the following terms and conditions:

1. No in stream work during the fish-spawning season (April 1-June 30).
2. Work should be completed as quickly as possible during low flows in designated work areas only.
3. Any streambed disturbance should be restricted to the immediate area. In stream use of equipment should be kept to a minimum.
4. All shore areas disturbed by this operation must be reshaped, seeded and mulched immediately upon completion of work. The prompt establishment of vegetative cover will reduce future damage from high water levels.
5. Green concrete must not be put in the stream (highly toxic to aquatic life).
6. Guidance should be obtained from NRCS (formerly SCS) and a registered engineer for the design and construction. Must allow for passage of at least ten-year year flood flow.

EQM Gathering QPCQ, LLC
LS-15-VI/09-1750
Page 2
March 18, 2016

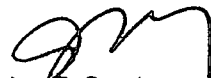
7. Best management practices should be followed; measures such as hay bales must be used to reduce downstream siltation.
8. Applicant is responsible for removing debris from in and around the installation periodically to prevent stream flow obstruction.
9. Durable head walls of logs, crossties, rock, or concrete shall be constructed at both the upstream and downstream ends of crossing to prevent erosion of fill material into the stream.
10. The State's issuance of this Right-of-Entry does not provide for the applicant to work outside the requested boundaries nor does the State assume any liability for the applicant's/landowner's construction activities. By accepting this Right-of-Entry, the applicant/landowner assumes liability for any/all damages caused by this activity to both upstream and downstream landowners.

Guidelines of Best Management Practices for Sediment and Erosion Control as outlined by the Section of Water Resources, Division of Environmental Protection must be followed. Copies of those guidelines are available from the Section of Water Resources, Telephone No. (304) 926-0440.

The issuance of this Right of Entry by the Division of Natural Resources does not preclude the necessity for you to obtain a permit from the U.S. Corps of Engineers District Office, Permit Section, or any other state or federal permits which may be required by law, nor does this Right of Entry negate the need to comply with the West Virginia Water Pollution Control Act and/or the State Environmental Quality Board's administrative regulations, applicant is also responsible for determining if the proposed activity is located within an identified flood plain and it is the applicant's responsibility for contacting the local governmental agency in charge of that program and obtaining a flood plain development permit for it. This Right of Entry does not grant any rights or privileges, or permission to enter upon or to cross the property of any other person, nor is permission granted to remove any material that lies upon the property of any other persons. Work should be completed in as brief a period as possible and within one year from the date of this letter. In the event you fail or refuse to comply with any of the terms or conditions herein, this Right of Entry will be canceled and considered null and void and the Division will reject further applications.

Your payment is now due and payable in the amount of \$2200.00 to the Division of Natural Resources covering the first year's annual fee of this agreement. Your agreement will be effective upon receipt of your payment in full. You must notify this office in writing when this installation has been removed.

Sincerely,


Joe T. Scarberry, Supervisor
Office of Land and Streams

JTS:cb

pc: DNR Fish Biologist
Jeremy Bandy, Environmental Enforcement
DNR Conservation Officers



DIVISION OF NATURAL RESOURCES

324 Fourth Avenue, Room 200
South Charleston WV 25303-1228
TDD (304) 558-1439
TDD 1-800-354-6087
Fax (304) 558-6048
Telephone (304) 558-3225

Earl Ray Tomblin
Governor

Robert A. Fala
Director

March 18, 2016

Division of Natural Resources
LICENSE AND RIGHT OF ENTRY

Re: P-15-VI/09-1751

EQM Gathering OPCO, LLC
Matt Hoover
c/o The Gateway Engineers, Inc.
Attention: Matthew E. Bagaley
400 Holiday Drive, Suite 300
Pittsburgh, PA 15220-

Dear Mr. Hoover:

The Division of Natural Resources hereby grants to you for a term of ten (10) years, from the date hereof, a License and Right of Entry to construct, replace, cover, repair, operate, maintain, use and remove a sixteen inch (16") steel pipeline (MOSA D002) at six (6) separate locations along unnamed tributaries of Arnold Creek, Rock Run, and Middle Island Creek, near West Union in Doddridge County, West Virginia, as shown located and highlighted in red on the map attached hereto as Exhibit A.

This License and Right of Entry is subject to the following terms and conditions:

High Quality Streams (HQS) as listed in the West Virginia Division of Natural Resources High Quality Stream Sixth Edition published in 2001 and for any trout streams and direct tributaries of trout streams:

- Directional boring is the only method permitted during the fish spawning season. Fish spawning season for warmwater streams runs from April 1st through June 30th. Trout spawning season runs from October 1st through April 30th.
- Other dry ditch methods (pump around, flume or cofferdam) as described in WVDEP water resources manual (published 2006) on page 3.21-4 may be used outside of spawning seasons.
- Each crossing that utilizes dry ditch methods must be completed in 2 consecutive work days.

Non-high quality stream:

- Directional boring or other dry ditch methods (pump around, flume or cofferdam) as described in WVDEP water resources manual (published 2006) on page 3.21-4 may be used at all times during fish spawning season from April 1st through June 30th. This eliminates the need for spawning season restrictions.
- Crossings using methods other than directional boring. Must be completed in 1 work

EQM Gathering OPCO, LLC
P-15-VI/09-1751
Page 2
March 18, 2016

day.

- Only ephemeral/intermittent streams that are dry can be trenched.

Bank Stabilization

All bank stabilization projects must begin immediately upon completion of utility line crossing and be completed within 24 hours of completion of utility line crossing.

Freshwater Mussels

Mussel surveys on streams with known US Fish and Wildlife listed or candidate endangered species will be required if directional boring is not an option. Contact Janet Clayton of the WVDNR Wildlife Diversity Program for information concerning mussels at 304-637-0245.

For further assistance, contact the appropriate WVDNR District Fisheries Biologist.
District 1 304-825-6787 District 2 304-822-3551 District 3 304-924-6211
District 4 304-256-6947 District 5 304-675-0871 District 6 304-420-4550

The issuance of this License and Right of Entry by the Division of Natural Resources does not preclude the necessity to obtain a permit from the Corps of Engineers or any other state or federal permits which may be required by law, nor does this License and Right of Entry negate the need to comply with the West Virginia Water Pollution Control Act and/or the State Environmental Quality Board's administrative regulations, applicant is also responsible for determining if the proposed activity is located within an identified flood plain and it is the applicant's responsibility for contacting the local governmental agency in charge of that program and obtaining a flood plain development permit for it. This License and Right of Entry does not grant any rights or privileges, or permission to enter upon or to cross the property of any other person, nor is permission granted to remove any material that lies upon the property of any other persons. Work should be completed in as brief a period as possible and within one year from the date of this letter. In the event you fail or refuse to comply with any of the terms or conditions herein, this License and Right of Entry will be canceled and considered null and void and the Division will reject further applications.

Your check in the amount of \$1350.00 is now due and payable to the Division of Natural Resources covering the (10) ten-year fee of this agreement. Your agreement will be effective upon receipt of your payment in full.

Sincerely,



Joe T. Scarberry, Supervisor
Office of Land and Streams

JTS:cb

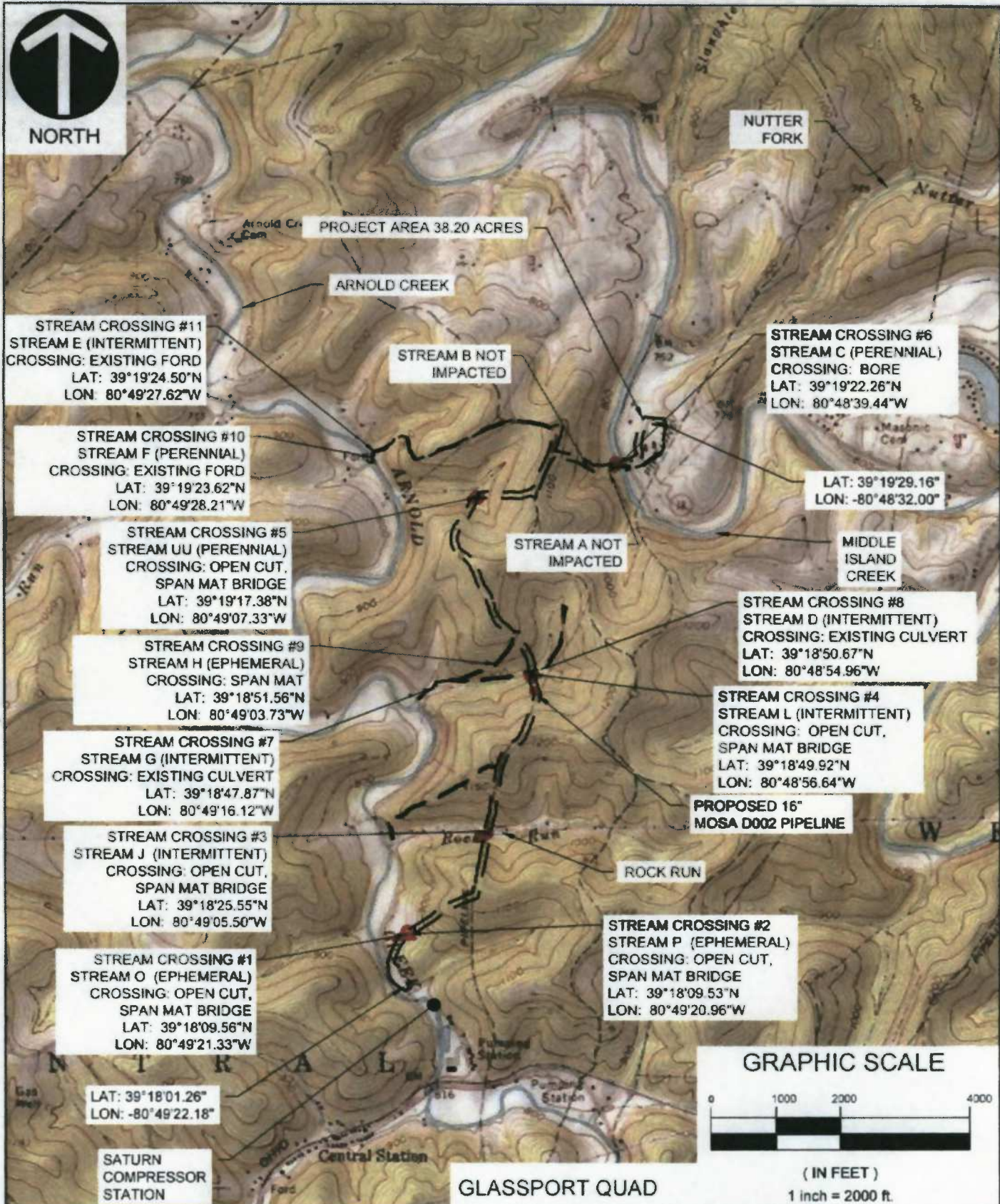
attachment

pc: DNR Fish Biologist
Jeremy Bandy, Environmental Enforcement
DNR Conservation Officers



P-15-VI/09-1751

Exhibit A



SATURN COMPRESSOR STATION

GLASSPORT QUAD

STREAM IMPACT LOCATION MAP	
Project Number	15-09-1751
Drawn By	JLW
Check By	JLW
Issue Number	01
Drawn By	JLW
Checked By	JLW
Project Manager	JLW

MOSA D002 PIPELINE
JEFFERSON HILLS TOWNSHIP, ALLEGHENY COUNTY, PA
UNION TOWNSHIP, WASHINGTON COUNTY, PA

PREPARED FOR:
EQM GATHERING OPCO, LLC
825 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	By	REVISION RECORD
01	JLW	ISSUED
02	JLW	REVISED
03	JLW	REVISED
04	JLW	REVISED
05	JLW	REVISED
06	JLW	REVISED
07	JLW	REVISED
08	JLW	REVISED

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
855-534-8284
gatewayengineers.com



DIVISION OF NATURAL RESOURCES

324 Fourth Avenue, Room 200
South Charleston WV 25303-1228
TDD (304) 558-1439
TDD 1-800-354-6087
Fax (304) 558-6048
Telephone (304) 558-3225

Earl Ray Tomblin
Governor

Robert A. Fala
Director

March 18, 2016

Division of Natural Resources
RIGHT OF ENTRY

Re: **LS-15-VI/09-1752**

EQM Gathering OPCO, LLC
Matt Hoover
c/o The Gateway Engineers, Inc.
Attention: Matthew E. Bagaley
400 Holiday Drive, Suite 300
Pittsburgh, PA 15220-

Dear Mr. Hoover:

The Division of Natural Resources hereby grants to you for a period of ten (10) years from the date hereof, a Right of Entry to install, use and maintain a span mat bridge crossing (MOSA D002) at ten (10) separate locations along Arnold Creek, unnamed tributaries of Arnold Creek, and Rock Run near West Union in Doddridge County, West Virginia.

This Right of Entry is subject to the following terms and conditions:

1. No in stream work during the fish-spawning season (April 1-June 30).
2. Work should be completed as quickly as possible during low flows in designated work areas only.
3. Any streambed disturbance should be restricted to the immediate area. In stream use of equipment should be kept to a minimum.
4. All shore areas disturbed by this operation must be reshaped, seeded and mulched immediately upon completion of work. The prompt establishment of vegetative cover will reduce future damage from high water levels.
5. Green concrete must not be put in the stream (highly toxic to aquatic life).
6. Guidance should be obtained from NRCS (formerly SCS) and a registered engineer for the design and construction. Must allow for passage of at least ten-year year flood flow.
7. Best management practices should be followed; measures such as hay

EQM Gathering OPCO, LLC
LS-15-VI/09-1752
Page 2
March 18, 2016

bales must be used to reduce downstream siltation.

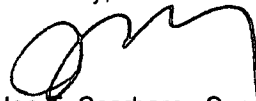
8. Applicant is responsible for removing debris from in and around the installation periodically to prevent stream flow obstruction.
9. Durable head walls of logs, crossties, rock, or concrete shall be constructed at both the upstream and downstream ends of crossing to prevent erosion of fill material into the stream.
10. The State's issuance of this Right-of-Entry does not provide for the applicant to work outside the requested boundaries nor does the State assume any liability for the applicant's/landowner's construction activities. By accepting this Right-of-Entry, the applicant/landowner assumes liability for any/all damages caused by this activity to both upstream and downstream landowners.

Guidelines of Best Management Practices for Sediment and Erosion Control as outlined by the Section of Water Resources, Division of Environmental Protection must be followed. Copies of those guidelines are available from the Section of Water Resources, Telephone No. (304) 926-0440.

The issuance of this Right of Entry by the Division of Natural Resources does not preclude the necessity for you to obtain a permit from the U.S. Corps of Engineers District Office, Permit Section, or any other state or federal permits which may be required by law, nor does this Right of Entry negate the need to comply with the West Virginia Water Pollution Control Act and/or the State Environmental Quality Board's administrative regulations, applicant is also responsible for determining if the proposed activity is located within an identified flood plain and it is the applicant's responsibility for contacting the local governmental agency in charge of that program and obtaining a flood plain development permit for it. This Right of Entry does not grant any rights or privileges, or permission to enter upon or to cross the property of any other person, nor is permission granted to remove any material that lies upon the property of any other persons. Work should be completed in as brief a period as possible and within one year from the date of this letter. In the event you fail or refuse to comply with any of the terms or conditions herein, this Right of Entry will be canceled and considered null and void and the Division will reject further applications.

Your payment is now due and payable in the amount of \$1000.00 to the Division of Natural Resources covering the first year's annual fee of this agreement. Your agreement will be effective upon receipt of your payment in full. You must notify this office in writing when this installation has been removed.

Sincerely,



Joe T. Scarberry, Supervisor
Office of Land and Streams

JTS:cb

pc: DNR Fish Biologist
Jeremy Bandy, Environmental Enforcement
DNR Conservation Officers



REPLY TO
ATTENTION OF

DEPARTMENT OF THE ARMY
HUNTINGTON DISTRICT, CORPS OF ENGINEERS
502 EIGHTH STREET
HUNTINGTON, WEST VIRGINIA 25701-2070

March 17, 2016

Regulatory Division
Energy Resource Branch
LRH-2015-01041-OHR-Arnold Creek

Mr. Matt Hoover
EQM Gathering OPCO, LLC.
625 Liberty Avenue, Suite 1700
Pittsburgh, Pennsylvania 15222

Dear Mr. Hoover:

I refer to your pre-construction notification (PCN) dated December 2015, and received in this office on December 4, 2015, regarding the MOSA D002 Pipeline Project. The MOSA D002 Pipeline Project would involve the construction of a 2.5 mile 16-inch steel natural gas pipeline, which would connect the existing Saturn Compressor Station to the existing WG100 Pipeline. The proposed pipeline project would also involve the improvement of existing access roads. On-site waters flow into Arnold Creek, an indirect tributary to the Ohio River, a traditional navigable water of the United States (U.S.). The project site is located in Doddridge County, West Virginia (39.302655°North, 80.822591°West). The PCN has been assigned the following number: LRH-2015-01041-OHR-Arnold Creek. Please reference this number on all future correspondence related to this project.

The U.S. Army Corps of Engineers (Corps) authority to regulate waters of the U.S. is based on the definitions and limits of jurisdiction contained in 33 CFR 328 and 33 CFR 329. Section 404 of the Clean Water Act (Section 404) requires a Department of the Army (DA) permit be obtained prior to discharging dredged or fill material into waters of the U.S., including wetlands. Section 10 of the Rivers and Harbors Act of 1899 (Section 10) requires a DA permit be obtained for any work in, on, over or under a navigable water.

Based on a review of the information provided, nine (9) perennial streams totaling 7,025 linear feet (lf), eleven (11) intermittent streams totaling 2,172 lf, thirty-seven (37) ephemeral streams totaling 4,298 lf, and seven (7) palustrine emergent (PEM) wetlands totaling 0.33 acre are located within the preliminary jurisdictional determination (PJD) boundary, as described in the enclosed PJD form. The on-site aquatic resources may be waters of the U.S. in accordance with the Regulatory Guidance Letter for Jurisdictional Determinations (JDs) issued by the Corps

on June 26, 2008 (Regulatory Guidance Letter No. 08-02). As indicated in the guidance, this PJD is non-binding and cannot be appealed (33 CFR 331.2) and only provides a written indication that waters of the U.S. may be present on-site. You have declined to exercise the option to obtain an approved JD in this instance and at this time. However, for the purposes of the determination of impacts, compensatory mitigation, and other resource protection measures for activities that require authorization from this office, the streams referenced above will be evaluated as if they are waters of the U.S.

Enclosed please find two (2) copies of the PJD form. If you agree with the findings of this PJD and understand your options regarding the same, please sign and date one copy of the PJD form and return it to this office within 30 days of receipt of this letter. You should submit the signed copy via email to michelle.m.staley@usace.army.mil or to the following address:

U.S. Army Corps of Engineers
Huntington District, Regulatory Division
Energy Resource Branch
Attn: Michelle Staley (LRH-2015-01041-OHR)
502 Eighth Street
Huntington, West Virginia 25701

The proposed project, as described in the submitted information, has been reviewed in accordance with Section 404 and Section 10. Based on your description of the proposed work, and other information available to us, it has been determined that this project will not involve activities subject to the requirements of Section 10. However, this project will include the discharge of dredged or fill material into waters of the U.S. subject to the requirements of Section 404.

In the PCN received in this office on December 4, 2015, you have requested a DA authorization to temporarily discharge of dredged and/or fill material into 414 lf of ten (10) streams in conjunction with the MOSA D002 Pipeline Project. The proposed discharge of dredged and/or fill material into waters of the U.S. is described in Table 1 below. The information submitted indicates the streams temporarily impacted by the discharge of dredged and/or fill material for the pipeline installation will be restored to pre-construction conditions upon completion of the project. All disturbed areas will be returned to their original slope and contour, stabilized, and seeded. No permanent relocation of streams, wetlands, or other water bodies will occur.

Based on your description of the proposed utility line activities project, and other information available to us, it has been determined the proposed discharge of dredged and/or fill material into waters of the U.S., as described on Table 1 below, for the construction of the MOSA D002 Pipeline Project meets the criteria for authorization under Nationwide Permit (NWP) #12 (enclosed) under

the February 21, 2012 Federal Register, Notice of Reissuance of NWP's (77 FR 10184) provided you comply with all terms and conditions of the enclosed material, including **the enclosed special conditions**. The West Virginia Department of Environmental Protection has issued 401 Water Quality Certification for this NWP. A copy of this NWP can be found on our website at <http://www.lrh.usace.army.mil/Missions/Regulatory.aspx>.

In view of the above, your utility line activities project is authorized subject to the terms and conditions of the enclosed material, including the enclosed special conditions. It is your responsibility to ensure that your work conforms to all of the environmental management conditions listed within the enclosed material. Please be aware this NWP verification does not obviate the requirement to obtain any state or local assent required by law for the activities.

This verification is valid until the expiration date of the NWP's, unless the NWP authorization is modified, suspended, or revoked. The verification will remain valid if the NWP authorization is reissued without modification or the activity complies with any subsequent modification of the NWP authorization. All of the existing NWP's are scheduled to be modified, reissued, or revoked on March 18, 2017. Prior to this date, it is not necessary to contact this office for re-verification of your project unless the plans for the proposed activity are modified. Furthermore, if you commence or are under contract to commence this activity before March 18, 2017, you will have twelve (12) months from the date of the modification or revocation of the NWP to complete the activity under the present terms and conditions of this NWP.

A copy of this NWP and verification letter must be supplied to your project engineer responsible for construction activities. A copy of the verification letter must be kept at the site during construction. Upon completion of the work, the enclosed certification must be signed and returned to this office. If you have any questions concerning the above, please contact Michelle Staley at (304) 399-5273 or by email at michelle.m.staley@usace.army.mil.

Sincerely,



Christopher L. Carson
Regulatory Project Manager
Energy Resource Branch

Enclosure(s)

Cc:

Mr. Matt Bagaley

The Gateway Engineers, Inc.

400 Holiday Drive, Suite 300

Pittsburgh, Pennsylvania 15220

mbagaley@gatewayengineers.com

Table 1- Authorized discharge of dredged and/or fill material into waters of the U.S. associated with the construction of the EQM Gathering OPCO, LLC, MOSA D022 Pipeline Project LRH-2015-01041-OHR- Arnold Cree

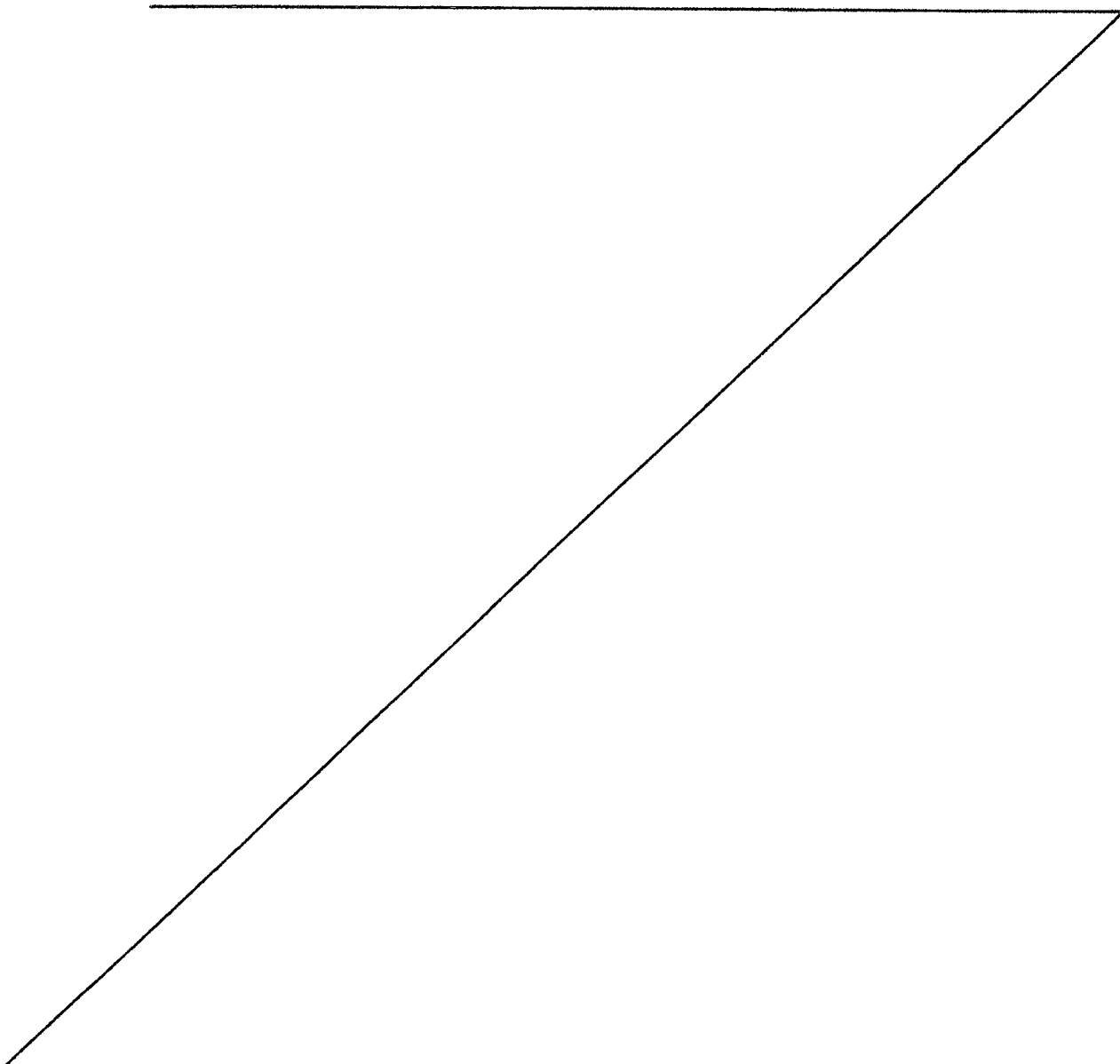
Waters ID	Latitude °N & Longitude °W		Flow Regime	Length (ft) of Fill	Area (ac) of Fill	Other Pertinent Information
Stream O	39.227281	80.801658	Ephemeral	54	0.004	Temporary Pipeline Crossing – Open Cut
Stream P	39.231725	80.799833	Ephemeral	30	0.001	Temporary Pipeline Crossing – Open Cut
Stream J	39.253194	80.805381	Intermittent	53	0.012	Temporary Pipeline Crossing – Open Cut
Stream L	39.252581	80.805314	Intermittent	52	0.018	Temporary Pipeline Crossing – Open Cut
Stream U	39.220583	80.796258	Perennial	51	0.014	Temporary Pipeline Crossing – Open Cut
Stream C	39.247950	80.804478	Perennial	0	0	Directional Boring – Avoidance
Stream G	39.254347	80.808511	Intermittent	27	0.009	Temporary Pipeline Crossing – Open Cut
Stream D	39.247839	80.804262	Intermittent	48	0.022	Temporary Pipeline Crossing – Open Cut
Stream H	39.253786	80.807042	Ephemeral	24	0.002	Temporary Pipeline Crossing – Open Cut
Stream F	39.247575	80.807375	Perennial	28	0.019	Temporary Pipeline Crossing – Open Cut
Stream E	39.247894	80.805728	Intermittent	47	0.011	Temporary Pipeline Crossing – Open Cut

**Nationwide Permit 12 Verification Special Conditions
EQT Gathering, LLC, MOSA D002 Pipeline Project
LRH-2015-01041-OHR-Arnold Creek
Page 1 of 2**

1. Should new information regarding the scope and/or impacts of the project become available that was not submitted to this office during our review of the proposal, the permittee shall submit written information concerning proposed modification(s) to this office for review and evaluation, as soon as practicable.
2. The *Myotis* Bat Conservation Plan (MBCP), approved by the United States Fish and Wildlife Service (USFWS) on February 8, 2016, contains conservation measures for the federally-listed Indiana bat (*Myotis sodalis*) and northern long-eared bat (*Myotis septentrionalis*). Your Nationwide Permit verification is conditional upon your compliance with the conservation measures identified by the USFWS and within the MBCP, which are hereby incorporated in this permit. Failure to comply with the conservation measures identified in the MBCP would constitute non-compliance with your Corps permit. The USFWS - West Virginia Field Office is the appropriate authority to determine compliance with the conservation measures identified within the MBCP and the Endangered Species Act (ESA).
3. The USFWS and West Virginia Department of Natural Resources (WV DNR) requested the proposed work be completed prior to June 15 in order to minimize impacts to mussels. The applicant shall utilize site specific best management practices for sediment and erosion control and will be fully implemented during construction activities at the site. The project shall comply with the requirements set forth in the West Virginia Department of Environmental Protection's 2006 Best Management Protection Manual and the 2012 Erosion and Sediment Control Field Oil and Gas Manual.
4. Section 7 obligations under Endangered Species Act must be reconsidered if new information reveals impacts of the project that may affect federally listed species or critical habitat in a manner or to the extent not previously considered, the proposed project is subsequently modified to include activities which were not considered during Section 7 consultation with the United States Fish and Wildlife Service, or new species are listed or critical habitat designated that might be affected by the subject project.
5. In the event any previously unknown historic or archaeological sites or human remains are uncovered while accomplishing the activity authorized by this nationwide permit you must immediately and contact local, state and county law enforcement offices (only contact law enforcement on findings of human remains), the Corps at (304) 399-5610 and West Virginia State Historic Preservation Office at (304) 558-0220. You must, to the

**Nationwide Permit 12 Verification Special Conditions
EQT Gathering, LLC, MOSA D002 Pipeline Project
LRH-2015-01041-OHR-Arnold Creek
Page 2 of 2**

maximum extent practicable, avoid construction activities that may affect the remains and artifacts until the required coordination has been completed. The Corps will initiate the Federal, state and tribal coordination required to comply with the National Historic Preservation Act and applicable state and local laws and regulations. Federally recognized tribes are afforded a government-to-government status as sovereign nations and consultation is required under Executive Order 13175 and 36 CFR Part 800.



**NOTIFICATION OF ADMINISTRATIVE APPEAL OPTIONS AND PROCESS AND
REQUEST FOR APPEAL**

Applicant: EQM Gathering OPCO, LLC.		File Number: 2015-1041-OHR	Date: 3/17/2016
Attached is:		See Section below	
	INITIAL PROFFERED PERMIT (Standard Permit or Letter of permission)	A	
	PROFFERED PERMIT (Standard Permit or Letter of permission)	B	
	PERMIT DENIAL	C	
	APPROVED JURISDICTIONAL DETERMINATION	D	
X	PRELIMINARY JURISDICTIONAL DETERMINATION	E	

SECTION I - The following identifies your rights and options regarding an administrative appeal of the above decision. Additional information may be found at <http://usace.army.mil/inet/functions/cw/cecwo/reg> or Corps regulations at 33 CFR Part 391.

A: INITIAL PROFFERED PERMIT: You may accept or object to the permit.

- **ACCEPT:** If you received a Standard Permit, you may sign the permit document and return it to the district engineer for final authorization. If you received a Letter of Permission (LOP), you may accept the LOP and your work is authorized. Your signature on the Standard Permit or acceptance of the LOP means that you accept the permit in its entirety, and waive all rights to appeal the permit, including its terms and conditions, and approved jurisdictional determinations associated with the permit.
- **OBJECT:** If you object to the permit (Standard or LOP) because of certain terms and conditions therein, you may request that the permit be modified accordingly. You must complete Section II of this form and return the form to the district engineer. Your objections must be received by the district engineer within 60 days of the date of this notice, or you will forfeit your right to appeal the permit in the future. Upon receipt of your letter, the district engineer will evaluate your objections and may: (a) modify the permit to address all of your concerns, (b) modify the permit to address some of your objections, or (c) not modify the permit having determined that the permit should be issued as previously written. After evaluating your objections, the district engineer will send you a proffered permit for your reconsideration, as indicated in Section B below.

B: PROFFERED PERMIT: You may accept or appeal the permit

- **ACCEPT:** If you received a Standard Permit, you may sign the permit document and return it to the district engineer for final authorization. If you received a Letter of Permission (LOP), you may accept the LOP and your work is authorized. Your signature on the Standard Permit or acceptance of the LOP means that you accept the permit in its entirety, and waive all rights to appeal the permit, including its terms and conditions, and approved jurisdictional determinations associated with the permit.
- **APPEAL:** If you choose to decline the proffered permit (Standard or LOP) because of certain terms and conditions therein, you may appeal the declined permit under the Corps of Engineers Administrative Appeal Process by completing Section II of this form and sending the form to the division engineer. This form must be received by the division engineer within 60 days of the date of this notice.

C: PERMIT DENIAL: You may appeal the denial of a permit under the Corps of Engineers Administrative Appeal Process by completing Section II of this form and sending the form to the division engineer. This form must be received by the division engineer within 60 days of the date of this notice.

D: APPROVED JURISDICTIONAL DETERMINATION: You may accept or appeal the approved JD or provide new information.

- **ACCEPT:** You do not need to notify the Corps to accept an approved JD. Failure to notify the Corps within 60 days of the date of this notice means that you accept the approved JD in its entirety, and waive all rights to appeal the approved JD.
- **APPEAL:** If you disagree with the approved JD, you may appeal the approved JD under the Corps of Engineers Administrative Appeal Process by completing Section II of this form and sending the form to the division engineer. This form must be received by the division engineer within 60 days of the date of this notice.

E: PRELIMINARY JURISDICTIONAL DETERMINATION: You do not need to respond to the Corps regarding the preliminary JD. The Preliminary JD is not appealable. If you wish, you may request an approved JD (which may be appealed), by contacting the Corps district for further instruction. Also you may provide new information for further consideration by the Corps to reevaluate the JD.

SECTION II REQUEST FOR APPEAL or OBJECTIONS TO AN INITIAL PROFFERED PERMIT

REASONS FOR APPEAL OR OBJECTIONS: (Describe your reasons for appealing the decision or your objections to an initial proffered permit in clear concise statements. You may attach additional information to this form to clarify where your reasons or objections are addressed in the administrative record.)

ADDITIONAL INFORMATION: The appeal is limited to a review of the administrative record, the Corps memorandum for the record of the appeal conference or meeting, and any supplemental information that the review officer has determined is needed to clarify the administrative record. Neither the appellant nor the Corps may add new information or analyses to the record. However, you may provide additional information to clarify the location of information that is already in the administrative record.

POINT OF CONTACT FOR QUESTIONS OR INFORMATION

If you have questions regarding this decision and/or the appeal process you may contact:

Ginger Mullins, Chief, Regulatory Division, 304-399-5389
Teresa Spagna, Chief, North Regulatory Branch 304-399-5210
Susan Porter, Chief, South Regulatory Branch, 304 399-5710
Mike Hatten, Chief, Energy Resource Branch, 304-399-5610
Address: U.S. Army Corps of Engineers
Regulatory Branch
502 8th Street
Huntington, WV 25701

If you only have questions regarding the appeal process you may also contact:

U.S. Army Corps of Engineers
Great Lakes and Ohio River Division
550 Main Street, Room 10524
Cincinnati, OH 45202-3222
Phone: (513) 684-7261
Fax: (513) 684-2460

RIGHT OF ENTRY: Your signature below grants the right of entry to Corps of Engineers personnel, and any government consultants, to conduct investigations of the project site during the course of the appeal process. You will be provided a 15 day notice of any site investigation, and will have the opportunity to participate in all site investigations.

Signature of appellant or agent.

Date:

Telephone number:

COMPLETION OF WORK FORM

Permit: LRH-2015-01041-OHR-Arnold Creek
MOSA D022 Pipeline Project

Permittee: EQM Gathering OOPCO, LLC.

Date of Issue: 17 March 2016

Upon completion of the activity authorized by this permit and any mitigation required by the permit, sign this certification and return it to the following address:

Huntington District
U.S. Army Corps of Engineers
502 8th Street
Huntington, WV 25701-2070
Attn: RD-E

Please note that your permitted activity is subject to a compliance inspection by an U.S. Army Corps of Engineers representative. If you fail to comply with this permit you are subject to permit suspension, modification, or revocation.

I hereby certify that the work authorized by above referenced permit has been completed in accordance with the terms and conditions of the said permit, and required mitigation was completed in accordance with the permit conditions.

Signature of Permittee

Date

PM - STALEY

PRELIMINARY JURISDICTIONAL DETERMINATION FORM

BACKGROUND INFORMATION

A. REPORT COMPLETION DATE FOR PRELIMINARY JURISDICTIONAL DETERMINATION (JD): March 17, 2016

B. NAME AND ADDRESS OF PERSON REQUESTING PRELIMINARY JD:

Mr. Matt Hoover
EQM Gathering OPCO, LLC.
625 Liberty Avenue, Suite 1700
Pittsburgh, Pennsylvania 15222

C. DISTRICT OFFICE, FILE NAME, AND NUMBER:

U.S. Army Corps of Engineers
Huntington District
LRH-2015-01041-OHR-Arnold Creek
MOSE D022 Pipeline Project

D. PROJECT LOCATION(S) AND BACKGROUND INFORMATION:

State: West Virginia

County: Doddridge

City: West Union

Center coordinates of site: 39.302655°North, 80.822591°West

Name of nearest waterbody: Arnold Creek

Identify (estimate) amount of waters in the review area:

Non-wetland waters: 13,495 linear feet, refer to Table 1

Cowardin Class: Riverine

Stream Flow: Perennial, intermittent, ephemeral

Wetlands: 0.33 acre

Cowardin Class: Palustrine emergent (PEM)

Name of any water bodies on the site that have been identified as Section 10 waters:

None

E. REVIEW PERFORMED FOR SITE EVALUATION (CHECK ALL THAT APPLY):

Office (Desk) Determination. Date: March 10, 2016

Field Determination. Date(s):

1. The Corps of Engineers believes that there may be jurisdictional waters of the United States on the subject site, and the permit applicant or other affected party who requested this preliminary jurisdictional determination (JD) is hereby advised of his or her option to request and obtain an approved JD for that site. Nevertheless, the permit applicant or other person who

requested this preliminary JD has declined to exercise the option to obtain an approved JD in this instance and at this time.

2. In any circumstance where a permit applicant obtains an individual permit, or a Nationwide General Permit (NWP) or other general permit verification requiring "pre-construction notification" (PCN), or requests verification for a non-reporting NWP or other general permit, and the permit applicant has not requested an approved JD for the activity, the permit applicant is hereby made aware of the following: (1) the permit applicant has elected to seek a permit authorization based on a preliminary JD, which does not make an official determination of jurisdictional waters; (2) that the applicant has the option to request an approved JD before accepting the terms and conditions of the permit authorization, and that basing a permit authorization on an approved JD could possibly result in less compensatory mitigation being required or different special conditions; (3) that the applicant has the right to request an individual permit rather than accepting the terms and conditions of the NWP or other general permit authorization; (4) that the applicant can accept a permit authorization and thereby agree to comply with all the terms and conditions of that permit, including whatever mitigation requirements the Corps has determined to be necessary; (5) that undertaking any activity in reliance upon the subject permit authorization without requesting an approved JD constitutes the applicant's acceptance of the use of the preliminary JD, but that either form of JD will be processed as soon as is practicable; (6) accepting a permit authorization (e.g., signing a proffered individual permit) or undertaking any activity in reliance on any form of Corps permit authorization based on a preliminary JD constitutes agreement that all wetlands and other water bodies on the site affected in any way by that activity are jurisdictional waters of the United States, and precludes any challenge to such jurisdiction in any administrative or judicial compliance or enforcement action, or in any administrative appeal or in any Federal court; and (7) whether the applicant elects to use either an approved JD or a preliminary JD, that JD will be processed as soon as is practicable. Further, an approved JD, a proffered individual permit (and all terms and conditions contained therein), or individual permit denial can be administratively appealed pursuant to 33 C.F.R. Part 331, and that in any administrative appeal, jurisdictional issues can be raised (see 33 C.F.R. 331.5(a)(2)). If, during that administrative appeal, it becomes necessary to make an official determination whether CWA jurisdiction exists over a site, or to provide an official delineation of jurisdictional waters on the site, the Corps will provide an approved JD to accomplish that result, as soon as is practicable.

This preliminary JD finds that there "may be" waters of the United States on the subject project site, and identifies all aquatic features on the site that could be affected by the proposed activity, based on the following information:

SUPPORTING DATA. :

Maps, plans, plots or plat submitted by or on behalf of the applicant/consultant:
Pre-Construction Notification Nationwide Permit 12, EQM Gathering POCO, LLC., MOSA D022 Pipeline in Doddridge County, West Virginia dated December 2015.

Data sheets prepared/submitted by or on behalf of the applicant/consultant.

Office concurs with data sheets/delineation report.

Office does not concur with data sheets/delineation report. Explain:

Data sheets prepared by the Corps:

Corps navigable waters' study:

- U.S. Geological Survey Hydrologic Atlas:
 - USGS NHD data.
 - USGS 8 and 12 digit HUC maps.
- U.S. Geological Survey map(s):
 - USDA Natural Resources Conservation Service Soil Survey.
 - National wetlands inventory map(s): NWI for West Virginia. USACE ORM NWI Dataset
 - State/Local wetland inventory map(s):
 - FEMA/FIRM maps:
 - 100-year Floodplain Elevation is: (National Geodetic Vertical Datum of 1929)
 - Photographs: Aerial (Name & Date): Google Earth
 - or Other (Name & Date): in the report reference above
 - Previous determination(s). File no. and date of response letter:
 - Other information (please specify):

IMPORTANT NOTE: The information recorded on this form has not necessarily been verified by the Corps and should not be relied upon for later jurisdictional determinations.

M. Jones 3-17-16

Signature and date of
Regulatory Project Manager
(REQUIRED)

Signature and date of
person requesting preliminary JD
(REQUIRED, unless obtaining the
signature is impracticable)

**Table 1 – On-site Aquatic Resources associated with the construction of the
EQM Gathering OPCO, LLC. – MOSA D022 Pipeline Project
LRH-2015-01041-OHR-Arnold Creek**

Waters ID	Latitude °N & Longitude °W		Flow Regime or Cowardin Class	Length (lf) of Waters in AOI	Area (ac) of Waters in AOI	Other Pertinent Information
Stream A	39.253652	80.803997	Perennial	242	N/A	Non-Section 10, Non-Wetland
Stream B	39.253736	80.803833	Intermittent	106	N/A	Non-Section 10, Non-Wetland
Stream C	39.247950	80.804478	Perennial	1,502	N/A	Non-Section 10, Non-Wetland
Stream D	39.247839	80.804262	Intermittent	107	N/A	Non-Section 10, Non-Wetland
Stream E	39.247894	80.805728	Intermittent	238	N/A	Non-Section 10, Non-Wetland
Stream F	39.247575	80.807375	Ephemeral	403	N/A	Non-Section 10, Non-Wetland
Stream G	39.254347	80.808511	Ephemeral	283	N/A	Non-Section 10, Non-Wetland
Stream H	39.253786	80.807042	Ephemeral	14	N/A	Non-Section 10, Non-Wetland
Stream I	39.253636	80.806447	Ephemeral	19	N/A	Non-Section 10, Non-Wetland
Stream J	39.253194	80.805381	Ephemeral	91	N/A	Non-Section 10, Non-Wetland

Table 1. Continued

Waters ID	Latitude °N & Longitude °W		Flow Regime or Cowardin Class	Length (lf) of Waters in AOI	Area (ac) of Waters in AOI	Other Pertinent Information
Stream K	39.252739	80.805208	Ephemeral	66	N/A	Non-Section 10, Non-Wetland
Stream L	39.252581	80.805314	Ephemeral	55	N/A	Non-Section 10, Non-Wetland
Stream M	39.251994	80.806108	Ephemeral	125	N/A	Non-Section 10, Non-Wetland
Stream N	39.225089	80.796967	Perennial	1,240	N/A	Non-Section 10, Non-Wetland
Stream O	39.227281	80.801658	Ephemeral	45	N/A	Non-Section 10, Non-Wetland
Stream P	39.231725	80.799833	Ephemeral	78	N/A	Non-Section 10, Non-Wetland
Stream Q	39.231639	80.799992	Perennial	229	N/A	Non-Section 10, Non-Wetland
Stream R	39.231642	80.800233	Intermittent	69	N/A	Non-Section 10, Non-Wetland
Stream S	39.23160	80.799989	Ephemeral	205	N/A	Non-Section 10, Non-Wetland
Stream T	39.224142	80.796247	Perennial	90	N/A	Non-Section 10, Non-Wetland
Stream U	39.220583	80.796258	Ephemeral	188	N/A	Non-Section 10, Non-Wetland
Stream V	39.220542	80.796586	Ephemeral	227	N/A	Non-Section 10, Non-Wetland
Stream W	39.223647	80.797806	Ephemeral	66	N/A	Non-Section 10, Non-Wetland

Table 1. Continued

Waters ID	Latitude °N & Longitude °W		Flow Regime or Cowardin Class	Length (lf) of Waters in AOI	Area (ac) of Waters in AOI	Other Pertinent Information
Stream X	39.224914	80.797708	Ephemeral	37	N/A	Non-Section 10, Non-Wetland
Stream 1	39.245922	80.803386	Ephemeral	37	N/A	Non-Section 10, Non-Wetland
Stream 2	39.242036	80.799067	Ephemeral	29	N/A	Non-Section 10, Non-Wetland
Stream 3	39.239544	80.796856	Ephemeral	449	N/A	Non-Section 10, Non-Wetland
Stream 4	39.239639	80.796567	Perennial	203	N/A	Non-Section 10, Non-Wetland
Stream 5	39.239722	80.796536	Ephemeral	59	N/A	Non-Section 10, Non-Wetland
Stream 6	39.239536	80.796631	Ephemeral	118	N/A	Non-Section 10, Non-Wetland
Stream 7	39.238750	80.795694	Ephemeral	163	N/A	Non-Section 10, Non-Wetland
Stream 8	39.234558	80.795742	Ephemeral	100	N/A	Non-Section 10, Non-Wetland
Stream 9	39.234317	80.79580	Ephemeral	250	N/A	Non-Section 10, Non-Wetland
Stream 10	39.234131	80.795769	Perennial	257	N/A	Non-Section 10, Non-Wetland
Stream 11	39.234264	80.795958	Ephemeral	89	N/A	Non-Section 10, Non-Wetland
Stream 12	39.234075	80.796256	Intermittent	415	N/A	Non-Section 10, Non-Wetland

Table 1. Continued

Waters ID	Latitude °N & Longitude °W		Flow Regime or Cowardin Class	Length (lf) of Waters in AOI	Area (ac) of Waters in AOI	Other Pertinent Information
Stream 13	39.236428	80.803231	Ephemeral	213	N/A	Non-Section 10, Non-Wetland
Stream 14	39.237661	80.804081	Ephemeral	24	N/A	Non-Section 10, Non-Wetland
Stream 15	39.242461	80.809742	Ephemeral	54	N/A	Non-Section 10, Non-Wetland
Stream 16	39.242739	80.810425	Ephemeral	46	N/A	Non-Section 10, Non-Wetland
Stream 17	39.243194	80.810067	Ephemeral	148	N/A	Non-Section 10, Non-Wetland
Stream 18	39.239158	80.793231	Ephemeral	34	N/A	Non-Section 10, Non-Wetland
Stream AA	39.190225	80.794942	Intermittent	223	N/A	Non-Section 10, Non-Wetland
Stream BB	39.190189	80.795386	Perennial	2,971	N/A	Non-Section 10, Non-Wetland
Stream CC	39.190078	80.797431	Intermittent	202	N/A	Non-Section 10, Non-Wetland
Stream DD	39.192111	80.799633	Ephemeral	50	N/A	Non-Section 10, Non-Wetland
Stream EE	39.192725	80.800439	Intermittent	231	N/A	Non-Section 10, Non-Wetland
Stream FF	39.194025	80.803169	Ephemeral	46	N/A	Non-Section 10, Non-Wetland
Stream GG	39.199292	80.806167	Intermittent	246	N/A	Non-Section 10, Non-Wetland

Table 1. Continued

Waters ID	Latitude °N & Longitude °W		Flow Regime or Cowardin Class	Length (lf) of Waters in AOI	Area (ac) of Waters in AOI	Other Pertinent Information
Stream HH	39.208575	80.804589	Ephemeral	99	N/A	Non-Section 10, Non-Wetland
Stream II	39.209347	80.806786	Ephemeral	36	N/A	Non-Section 10, Non-Wetland
Stream JJ	39.209489	80.806794	Ephemeral	78	N/A	Non-Section 10, Non-Wetland
Stream KK	39.210544	80.806833	Ephemeral	63	N/A	Non-Section 10, Non-Wetland
Stream LL	39.219944	80.796203	Perennial	291	N/A	Non-Section 10, Non-Wetland
Stream MM	39.209414	80.790225	Ephemeral	180	N/A	Non-Section 10, Non-Wetland
Stream NN	39.208758	80.790817	Intermittent	335	N/A	Non-Section 10, Non-Wetland
Stream OO	39.207178	80.790967	Ephemeral	31	N/A	Non-Section 10, Non-Wetland
Wetland A	39.223903	80.796150	PEM	N/A	0.077	Non-Section 10, Non-Wetland
Wetland I	39.245764	80.804253	PEM	N/A	0.030	Non-Section 10, Non-Wetland
Wetland 2	39.236356	80.803292	PEM	N/A	0.015	Non-Section 10, Non-Wetland
Wetland AA	39.190225	80.794942	PEM	N/A	0.054	Non-Section 10, Non-Wetland
Wetland BB	39.192183	80.799392	PEM	N/A	0.016	Non-Section 10, Non-Wetland
Wetland CC	39.196017	80.807556	PEM	N/A	0.082	Non-Section 10, Non-Wetland
Wetland DD	39.208931	80.790853	PEM	N/A	0.056	Non-Section 10, Non-Wetland

PRELIMINARY JURISDICTIONAL DETERMINATION FORM

BACKGROUND INFORMATION

A. REPORT COMPLETION DATE FOR PRELIMINARY JURISDICTIONAL DETERMINATION (JD): March 17, 2016

B. NAME AND ADDRESS OF PERSON REQUESTING PRELIMINARY JD:

Mr. Matt Hoover
EQM Gathering OPCO, LLC.
625 Liberty Avenue, Suite 1700
Pittsburgh, Pennsylvania 15222

C. DISTRICT OFFICE, FILE NAME, AND NUMBER:

U.S. Army Corps of Engineers
Huntington District
LRH-2015-01041-OHR-Arnold Creek
MOSE D022 Pipeline Project

D. PROJECT LOCATION(S) AND BACKGROUND INFORMATION:

State: West Virginia

County: Doddridge

City: West Union

Center coordinates of site: 39.302655°North, 80.822591°West

Name of nearest waterbody: Arnold Creek

Identify (estimate) amount of waters in the review area:

Non-wetland waters: 13,495 linear feet, refer to Table 1

Cowardin Class: Riverine

Stream Flow: Perennial, intermittent, ephemeral

Wetlands: 0.33 acre

Cowardin Class: Palustrine emergent (PEM)

Name of any water bodies on the site that have been identified as Section 10 waters:

None

E. REVIEW PERFORMED FOR SITE EVALUATION (CHECK ALL THAT APPLY):

Office (Desk) Determination. Date: March 10, 2016

Field Determination. Date(s):

1. The Corps of Engineers believes that there may be jurisdictional waters of the United States on the subject site, and the permit applicant or other affected party who requested this preliminary jurisdictional determination (JD) is hereby advised of his or her option to request and obtain an approved JD for that site. Nevertheless, the permit applicant or other person who

requested this preliminary JD has declined to exercise the option to obtain an approved JD in this instance and at this time.

2. In any circumstance where a permit applicant obtains an individual permit, or a Nationwide General Permit (NWP) or other general permit verification requiring "pre-construction notification" (PCN), or requests verification for a non-reporting NWP or other general permit, and the permit applicant has not requested an approved JD for the activity, the permit applicant is hereby made aware of the following: (1) the permit applicant has elected to seek a permit authorization based on a preliminary JD, which does not make an official determination of jurisdictional waters; (2) that the applicant has the option to request an approved JD before accepting the terms and conditions of the permit authorization, and that basing a permit authorization on an approved JD could possibly result in less compensatory mitigation being required or different special conditions; (3) that the applicant has the right to request an individual permit rather than accepting the terms and conditions of the NWP or other general permit authorization; (4) that the applicant can accept a permit authorization and thereby agree to comply with all the terms and conditions of that permit, including whatever mitigation requirements the Corps has determined to be necessary; (5) that undertaking any activity in reliance upon the subject permit authorization without requesting an approved JD constitutes the applicant's acceptance of the use of the preliminary JD, but that either form of JD will be processed as soon as is practicable; (6) accepting a permit authorization (e.g., signing a proffered individual permit) or undertaking any activity in reliance on any form of Corps permit authorization based on a preliminary JD constitutes agreement that all wetlands and other water bodies on the site affected in any way by that activity are jurisdictional waters of the United States, and precludes any challenge to such jurisdiction in any administrative or judicial compliance or enforcement action, or in any administrative appeal or in any Federal court; and (7) whether the applicant elects to use either an approved JD or a preliminary JD, that JD will be processed as soon as is practicable. Further, an approved JD, a proffered individual permit (and all terms and conditions contained therein), or individual permit denial can be administratively appealed pursuant to 33 C.F.R. Part 331, and that in any administrative appeal, jurisdictional issues can be raised (see 33 C.F.R. 331.5(a)(2)). If, during that administrative appeal, it becomes necessary to make an official determination whether CWA jurisdiction exists over a site, or to provide an official delineation of jurisdictional waters on the site, the Corps will provide an approved JD to accomplish that result, as soon as is practicable.

This preliminary JD finds that there "may be" waters of the United States on the subject project site, and identifies all aquatic features on the site that could be affected by the proposed activity, based on the following information:

SUPPORTING DATA. :

Maps, plans, plots or plat submitted by or on behalf of the applicant/consultant:
Pre-Construction Notification Nationwide Permit 12, EQM Gathering POCO, LLC., MOSA D022 Pipeline in Doddridge County, West Virginia dated December 2015.

Data sheets prepared/submitted by or on behalf of the applicant/consultant.
 Office concurs with data sheets/delineation report.
 Office does not concur with data sheets/delineation report. Explain:

Data sheets prepared by the Corps:

Corps navigable waters' study:

- U.S. Geological Survey Hydrologic Atlas:
 - USGS NHD data.
 - USGS 8 and 12 digit HUC maps.
- U.S. Geological Survey map(s):
 - USDA Natural Resources Conservation Service Soil Survey.
 - National wetlands inventory map(s): NWI for West Virginia. USACE ORM NWI Dataset
 - State/Local wetland inventory map(s):
 - FEMA/FIRM maps:
 - 100-year Floodplain Elevation is: (National Geodetic Vertical Datum of 1929)
 - Photographs: Aerial (Name & Date): Google Earth
 - or Other (Name & Date): in the report reference above
 - Previous determination(s). File no. and date of response letter:
 - Other information (please specify):

IMPORTANT NOTE: The information recorded on this form has not necessarily been verified by the Corps and should not be relied upon for later jurisdictional determinations.

Weller 3-17-16

Signature and date of
Regulatory Project Manager
(REQUIRED)

Signature and date of
person requesting preliminary JD
(REQUIRED, unless obtaining the
signature is impracticable)

**Table 1 – On-site Aquatic Resources associated with the construction of the
EQM Gathering OPCO, LLC. – MOSA D022 Pipeline Project
LRH-2015-01041-OHR-Arnold Creek**

Waters ID	Latitude °N & Longitude °W		Flow Regime or Cowardin Class	Length (lf) of Waters in AOI	Area (ac) of Waters in AOI	Other Pertinent Information
Stream A	39.253652	80.803997	Perennial	242	N/A	Non-Section 10, Non-Wetland
Stream B	39.253736	80.803833	Intermittent	106	N/A	Non-Section 10, Non-Wetland
Stream C	39.247950	80.804478	Perennial	1,502	N/A	Non-Section 10, Non-Wetland
Stream D	39.247839	80.804262	Intermittent	107	N/A	Non-Section 10, Non-Wetland
Stream E	39.247894	80.805728	Intermittent	238	N/A	Non-Section 10, Non-Wetland
Stream F	39.247575	80.807375	Ephemeral	403	N/A	Non-Section 10, Non-Wetland
Stream G	39.254347	80.808511	Ephemeral	283	N/A	Non-Section 10, Non-Wetland
Stream H	39.253786	80.807042	Ephemeral	14	N/A	Non-Section 10, Non-Wetland
Stream I	39.253636	80.806447	Ephemeral	19	N/A	Non-Section 10, Non-Wetland
Stream J	39.253194	80.805381	Ephemeral	91	N/A	Non-Section 10, Non-Wetland

Table 1. Continued

Waters ID	Latitude °N & Longitude °W		Flow Regime or Cowardin Class	Length (lf) of Waters in AOI	Area (ac) of Waters in AOI	Other Pertinent Information
Stream K	39.252739	80.805208	Ephemeral	66	N/A	Non-Section 10, Non-Wetland
Stream L	39.252581	80.805314	Ephemeral	55	N/A	Non-Section 10, Non-Wetland
Stream M	39.251994	80.806108	Ephemeral	125	N/A	Non-Section 10, Non-Wetland
Stream N	39.225089	80.796967	Perennial	1,240	N/A	Non-Section 10, Non-Wetland
Stream O	39.227281	80.801658	Ephemeral	45	N/A	Non-Section 10, Non-Wetland
Stream P	39.231725	80.799833	Ephemeral	78	N/A	Non-Section 10, Non-Wetland
Stream Q	39.231639	80.799992	Perennial	229	N/A	Non-Section 10, Non-Wetland
Stream R	39.231642	80.800233	Intermittent	69	N/A	Non-Section 10, Non-Wetland
Stream S	39.23160	80.799989	Ephemeral	205	N/A	Non-Section 10, Non-Wetland
Stream T	39.224142	80.796247	Perennial	90	N/A	Non-Section 10, Non-Wetland
Stream U	39.220583	80.796258	Ephemeral	188	N/A	Non-Section 10, Non-Wetland
Stream V	39.220542	80.796586	Ephemeral	227	N/A	Non-Section 10, Non-Wetland
Stream W	39.223647	80.797806	Ephemeral	66	N/A	Non-Section 10, Non-Wetland

Table 1. Continued

Waters ID	Latitude °N & Longitude °W		Flow Regime or Cowardin Class	Length (ft) of Waters in AOI	Area (ac) of Waters in AOI	Other Pertinent Information
Stream X	39.224914	80.797708	Ephemeral	37	N/A	Non-Section 10, Non-Wetland
Stream 1	39.245922	80.803386	Ephemeral	37	N/A	Non-Section 10, Non-Wetland
Stream 2	39.242036	80.799067	Ephemeral	29	N/A	Non-Section 10, Non-Wetland
Stream 3	39.239544	80.796856	Ephemeral	449	N/A	Non-Section 10, Non-Wetland
Stream 4	39.239639	80.796567	Perennial	203	N/A	Non-Section 10, Non-Wetland
Stream 5	39.239722	80.796536	Ephemeral	59	N/A	Non-Section 10, Non-Wetland
Stream 6	39.239536	80.796631	Ephemeral	118	N/A	Non-Section 10, Non-Wetland
Stream 7	39.238750	80.795694	Ephemeral	163	N/A	Non-Section 10, Non-Wetland
Stream 8	39.234558	80.795742	Ephemeral	100	N/A	Non-Section 10, Non-Wetland
Stream 9	39.234317	80.79580	Ephemeral	250	N/A	Non-Section 10, Non-Wetland
Stream 10	39.234131	80.795769	Perennial	257	N/A	Non-Section 10, Non-Wetland
Stream 11	39.234264	80.795958	Ephemeral	89	N/A	Non-Section 10, Non-Wetland
Stream 12	39.234075	80.796256	Intermittent	415	N/A	Non-Section 10, Non-Wetland

Table 1. Continued

Waters ID	Latitude °N & Longitude °W		Flow Regime or Cowardin Class	Length (lf) of Waters in AOI	Area (ac) of Waters in AOI	Other Pertinent Information
Stream 13	39.236428	80.803231	Ephemeral	213	N/A	Non-Section 10, Non-Wetland
Stream 14	39.237661	80.804081	Ephemeral	24	N/A	Non-Section 10, Non-Wetland
Stream 15	39.242461	80.809742	Ephemeral	54	N/A	Non-Section 10, Non-Wetland
Stream 16	39.242739	80.810425	Ephemeral	46	N/A	Non-Section 10, Non-Wetland
Stream 17	39.243194	80.810067	Ephemeral	148	N/A	Non-Section 10, Non-Wetland
Stream 18	39.239158	80.793231	Ephemeral	34	N/A	Non-Section 10, Non-Wetland
Stream AA	39.190225	80.794942	Intermittent	223	N/A	Non-Section 10, Non-Wetland
Stream BB	39.190189	80.795386	Perennial	2,971	N/A	Non-Section 10, Non-Wetland
Stream CC	39.190078	80.797431	Intermittent	202	N/A	Non-Section 10, Non-Wetland
Stream DD	39.192111	80.799633	Ephemeral	50	N/A	Non-Section 10, Non-Wetland
Stream EE	39.192725	80.800439	Intermittent	231	N/A	Non-Section 10, Non-Wetland
Stream FF	39.194025	80.803169	Ephemeral	46	N/A	Non-Section 10, Non-Wetland
Stream GG	39.199292	80.806167	Intermittent	246	N/A	Non-Section 10, Non-Wetland

Table 1. Continued

Waters ID	Latitude °N & Longitude °W		Flow Regime or Cowardin Class	Length (lf) of Waters in AOI	Area (ac) of Waters in AOI	Other Pertinent Information
Stream HH	39.208575	80.804589	Ephemeral	99	N/A	Non-Section 10, Non-Wetland
Stream II	39.209347	80.806786	Ephemeral	36	N/A	Non-Section 10, Non-Wetland
Stream JJ	39.209489	80.806794	Ephemeral	78	N/A	Non-Section 10, Non-Wetland
Stream KK	39.210544	80.806833	Ephemeral	63	N/A	Non-Section 10, Non-Wetland
Stream LL	39.219944	80.796203	Perennial	291	N/A	Non-Section 10, Non-Wetland
Stream MM	39.209414	80.790225	Ephemeral	180	N/A	Non-Section 10, Non-Wetland
Stream NN	39.208758	80.790817	Intermittent	335	N/A	Non-Section 10, Non-Wetland
Stream OO	39.207178	80.790967	Ephemeral	31	N/A	Non-Section 10, Non-Wetland
Wetland A	39.223903	80.796150	PEM	N/A	0.077	Non-Section 10, Non-Wetland
Wetland I	39.245764	80.804253	PEM	N/A	0.030	Non-Section 10, Non-Wetland
Wetland 2	39.236356	80.803292	PEM	N/A	0.015	Non-Section 10, Non-Wetland
Wetland AA	39.190225	80.794942	PEM	N/A	0.054	Non-Section 10, Non-Wetland
Wetland BB	39.192183	80.799392	PEM	N/A	0.016	Non-Section 10, Non-Wetland
Wetland CC	39.196017	80.807556	PEM	N/A	0.082	Non-Section 10, Non-Wetland
Wetland DD	39.208931	80.790853	PEM	N/A	0.056	Non-Section 10, Non-Wetland



REPLY TO
ATTENTION OF

DEPARTMENT OF THE ARMY
HUNTINGTON DISTRICT, CORPS OF ENGINEERS
502 EIGHTH STREET
HUNTINGTON, WEST VIRGINIA 25701-2070

MAR 17 2016

Regulatory Division
Energy Resource Branch
LRH-2015-01040-OHR – Arnold Creek
MOSA D003 and S036 Pipelines Project

PRELIMINARY JURISDICTIONAL DETERMINATION AND
NATIONWIDE PERMIT NO. 12 VERIFICATION

Mr. Matthew Hoover
EQM Gathering OPCO, LLC
625 Liberty Avenue, Suite 1700
Pittsburgh, Pennsylvania 15222

Dear Mr. Hoover:

I refer to the Pre-Construction Notification (PCN), received in this office on December 16, 2015, requesting a Department of the Army (DA) authorization to discharge dredged and/or fill material into waters of the United States (U.S.) in association with the MOSA D003 and S036 Pipelines Project. The project will involve the construction of approximately 5.4 miles of natural gas pipeline. The project is located approximately 3.0 miles southwest of West Union, in Doddridge County, West Virginia (39.277666° N, 80.803502° W). The PCN has been assigned the following file number: LRH-2015-01040-OHR-Arnolds Creek. Please reference this number on all future correspondence related to this project.

The U.S. Army Corps of Engineers (Corps) authority to regulate waters of the U.S. is based on the definitions and limits of jurisdiction contained in 33 CFR 328 and 33 CFR 329. Section 404 of the Clean Water Act (Section 404) requires a DA permit be obtained prior to placing dredged or fill material into waters of the U.S., including wetlands. Section 10 of the Rivers and Harbors Act of 1899 (Section 10) requires a DA permit be obtained for any work in, on, over or under a navigable water.

Preliminary Jurisdictional Determination

Based on a review of the information provided, six (6) perennial streams, totaling 860 linear feet, six (6) intermittent streams, totaling 362 linear feet, eleven (11) ephemeral streams, totaling 632 linear feet, and nine (9) emergent wetlands, totaling 0.404 acre, are located within the preliminary jurisdictional determination (PJD) boundary, as described in the enclosed PJD Form. On-site waters flow into the Arnold Creek, an indirect tributary of the Ohio River, a traditional navigable water of the U.S. This office has determined these may be waters of the U.S. in accordance with the Regulatory Guidance Letter (RGL) for Jurisdictional Determinations (JDs) issued by the Corps on June 26, 2008 (RGL No. 08-02).

As indicated in the guidance, this PJD is non-binding and cannot be appealed (33 CFR 331.2) and only provides a written indication that waters of the U.S., including wetlands, may be present on-site. You have declined to exercise the option to obtain an approved JD in this instance. However, for the purposes of the determination of impacts, compensatory mitigation, and other resource protection measures for activities that require authorization from this office, the streams and wetlands identified above will be evaluated as if they are waters of the U.S.

Enclosed please find two copies of the PJD form. If you agree with the findings of this PJD and understand your options regarding the same, please sign and date one copy of the PJD form and return it to this office within 30 days of receipt of this letter. You should submit the signed copy via e-mail to wes.barnett@usace.army.mil or to the following address:

U.S. Army Corps of Engineers
Huntington District, Regulatory Division
Attn: Wes Barnett (LRH-2015-01040),
502 8th Street
Huntington, West Virginia 25701

Nationwide Permit 12

The proposed project, as described in the submitted information, has been reviewed in accordance with Section 404 and Section 10. Based on your description of the proposed work, and other information available to us, it has been determined that this project will not involve activities subject to the requirements of Section 10. However, this project will include the discharge of dredged and/or fill material into waters of the U.S. subject to the requirements of Section 404.

According to the PCN materials that you have submitted, construction of the MOSA D003 and S036 Pipeline Project will result in the discharge of dredged and/or fill material into 884.5 linear feet of twenty-two (22) streams in association with twenty-two (22) single and complete projects. Upon installation of the pipeline, the temporarily affected waters of the U. S. will be restored to their pre-construction contours and elevations. The proposed discharges of dredged and/or fill material into waters of the U.S. are described within Table 1 below. In addition, the project will involve timbermat crossings and horizontal directional drilling (HDD) where the utility line encounters Streams FF, X, Y, and Wetland B. According to the PCN, the proposed HDD and timbermat crossings would not involve a discharge of dredged and/or fill material, temporary or permanent, into waters of the U.S. and thus is not subject to regulation under Section 404.

Based on your description of the utility line project, it has been determined the discharge of dredged and/or fill material into waters of the U.S., as described on Table 1 below, for the construction of the MOSA D003 and S036 Pipelines Project meets the criteria for authorization under Nationwide Permit (NWP) #12 (enclosed) under the February 21, 2012 Federal Register,

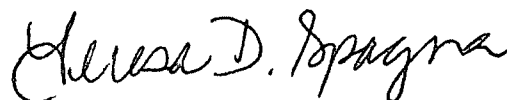
Notice of Reissuance of NWP's (77 FR 10184) provided you comply with all terms and conditions of the enclosed material **the enclosed special conditions**, and the 401 Water Quality Certification (WQC) issued by the West Virginia Department of Environmental Protection (WVDEP) on March 30, 2012. A copy of this NWP can also be found on our website at: <http://www.lrh.usace.army.mil/Missions/Regulatory.aspx>.

In view of the above, your project is permitted subject to the terms and conditions of the enclosed material. It is your responsibility to ensure that your work conforms to all of the conditions listed within the enclosed material, including the attached special conditions. Please be aware this NWP verification does not obviate the requirement to obtain any state or local assent required by law for the activities. A copy of these documents should be supplied to your project engineer responsible for project activities and a copy kept at the site during project work.

This verification is valid until the expiration date of the NWP's, unless the NWP authorization is modified, suspended, or revoked. The verification will remain valid if the NWP authorization is reissued without modification or the activity complies with any subsequent modification of the NWP authorization. All of the existing NWP's are scheduled to be modified, reissued, or revoked on March 18, 2017. Prior to this date, it is not necessary to contact this office for re-verification of your project unless the plans for the proposed activity are modified. Furthermore, if you commence or under contract to commence this activity before March 18, 2017, you will have twelve (12) months from the date of the modification or revocation of the NWP to complete the activity under the present terms and conditions of this NWP.

Enclosed is a copy of the NWP to be kept at the project site during project activities. Upon completion of the work, the enclosed certification must be signed and returned to this office. A copy of this letter is being provided to Ms. Wilma Reip of the WVDEP and Mr. Matthew Bagaley of The Gateway Engineers, LLC. If you have any questions concerning the above, please contact Wes Barnett of the Energy Resource Branch at (304) 399-6905 or by email at wes.barnett@usace.army.mil.

Sincerely,

A handwritten signature in black ink that reads "Teresa D. Spagna". The signature is written in a cursive style.

Teresa Spagna
Chief, North Branch

Enclosures

Table 1- Authorized discharge of dredged and/or fill material into waters of the U.S. associated with the EQM Gathering OPCO, LLC - MOSA D003 and S036 Pipeline Project LRH-2015-01040-OHR – Arnold Creek

Permit Areas	Aquatic Resource ID	Flow Regime or Cowardin Class	Temporary Fill Length of Stream (lf)	Temporary Fill Area of Stream (ac)	Permanent Fill Length of Stream (lf)	Permanent Fill Area of Stream (ac)	Regulated Discharge of Fill Activity
Crossing 1	Stream BB	Intermittent	50.6	0.014	---	---	Open-cut trench for pipeline crossing
Crossing 2	Stream EE	Perennial	51.3	0.029	---	---	Open-cut trench for pipeline crossing
Crossing 3	Stream W	Perennial	51.1	0.007	---	---	Open-cut trench for pipeline crossing
Crossing 4	Stream S	Perennial	50.6	0.035	---	---	Open-cut trench for pipeline crossing
Crossing 5	Stream R	Intermittent	51.8	0.019	---	---	Open-cut trench for pipeline crossing
Crossing 6	Stream Q	Perennial	50.1	0.055	---	---	Open-cut trench for pipeline crossing
Crossing 7	Stream M	Perennial	62.8	0.087	---	---	Open-cut trench for pipeline crossing
Crossing 8	Stream M	Perennial	58.4	0.068	---	---	Open-cut trench for pipeline crossing
Crossing 9	Stream D	Perennial	50.8	0.035	---	---	Open-cut trench for pipeline crossing
Crossing 10	Stream A	Perennial	44.8	0.005	---	---	Open-cut trench for pipeline crossing
Crossing 11	Stream BB	Intermittent	---	---	108.5	0.030	Culvert installation for access road improvement
Crossing 12	Stream OO	Ephemeral	---	---	25	0.005	Culvert installation for access road improvement
Crossing 13	Stream PP	Intermittent	---	---	25	0.002	Culvert installation for access road improvement
Crossing 14	Stream PP	Intermittent	---	---	25	0.002	Culvert installation for access road improvement

Crossing 15	Stream KK	Intermittent	---	---	25	0.003	Culvert installation for access road improvement
Crossing 16	Stream Y	Perennial	---	---	25	0.003	Culvert installation for access road improvement
Crossing 17	Stream II	Ephemeral	---	---	25	0.002	Culvert installation for access road improvement
Crossing 18	Stream Q	Perennial	---	---	25	0.017	Culvert installation for access road improvement
Crossing 19	Stream H	Ephemeral	---	---	25	0.003	Culvert installation for access road improvement
Crossing 20	Stream F	Perennial	---	---	25	0.009	Culvert installation for access road improvement
Crossing 21	Stream G	Ephemeral	---	---	25	0.009	Culvert installation for access road improvement
Crossing 22	Stream AA	Ephemeral	---	---	3.7	0.001	Culvert installation for access road improvement
Totals			522.3	0.354	362.2	0.086	

Nationwide Permit 12 Verification Special Conditions
EQT Gathering, LLC – MOSA D003 and S036 Pipeline Project
LRH-2015-01040-OHR – Arnold Creek

1. All work shall be conducted in accordance with the final plans provided by The Gateway Engineers, Inc. and dated December 15, 2015.
 2. Enclosed is a copy of Nationwide Permit 12, which will be kept at the site during construction. A copy of the nationwide permit verification, special conditions, and the enclosed construction plans must be kept at the site during construction. You will supply a copy of these documents to their project engineer responsible for construction activities.
 3. Should new information regarding the scope and/or impacts of the project become available that was not submitted to this office during our review of the proposal, the permittee will submit written information concerning proposed modification(s) to this office for review and evaluation, as soon as practicable.
 4. Construction of the EQM MOSA D003 and MOSA S036 Pipelines will result in the loss of potential habitat for the Indiana bat (*Myotis sodalis*) and northern long-eared bat (*Myotis septentrionalis*). The United States Fish and Wildlife Service (USFWS) Concurrence Form, signed on February 8, 2016, contains avoidance, minimization, and conservation measures for federally listed species. Your authorization under this Corps nationwide permit verification is conditional upon your compliance with the conservation measures incorporated by reference in this nationwide permit verification. Failure to comply with the conservation measures approved by the USFWS would constitute non-compliance with your Corps nationwide permit verification. The USFWS is the appropriate authority to determine compliance with the conservation measures identified and with the Endangered Species Act.
 5. Section 7 obligations under Endangered Species Act must be reconsidered if new information reveals impacts of the project that may affect federally listed species or critical habitat in a manner not previously considered, the proposed project is subsequently modified to include activities which were not considered during Section 7 consultation with the United States Fish and Wildlife Service, or new species are listed or critical habitat designated that might be affected by the subject project.
 6. In the event any previously unknown historic or archaeological sites or human remains are uncovered while accomplishing the activity authorized by this nationwide permit you must immediately and contact local, state and county law enforcement offices (only contact law enforcement on findings of human remains), the Corps at (304) 399-5610 and West Virginia State Historic Preservation Office at (304) 558-0220. You must, to the maximum extent practicable, avoid construction activities that may affect the remains and artifacts until the required coordination has been completed. The Corps will initiate the Federal, state and tribal coordination required to comply with the National Historic Preservation Act and applicable state and local laws and regulations. Federally recognized tribes are afforded a government-to-government status as sovereign nations and consultation is required under Executive Order 13175 and 36 CFR Part 800.
-

Issuance Date: March 19, 2012
Expiration Date: March 18, 2017

NWP # 12

NATIONWIDE PERMITS FOR THE STATE OF WEST VIRGINIA

CORPS OF ENGINEERS REGULATORY PROGRAM ISSUANCE OF NATIONWIDE PERMITS

On February 21, 2012, the Corps of Engineers published, in the Federal Register, the final rule for the administration of its nationwide permit program regulations under the Rivers and Harbors Act of 1899, Section 404 of the Clean Water Act, and the Marine Protection, Research and Sanctuaries Act. The rule became effective on March 19, 2012.

An integral part of the Corps' regulatory program is the concept of nationwide permits (NWP) for minor activities. NWP are activity specific, and are designed to relieve some of the administrative burdens associated with permit processing for both the applicant and the Federal government. The NWP, published in the February 21, 2012, Federal Register, Issuance of Nationwide Permits (77 FR 10184), are issued by the Chief of Engineers, and are intended to apply throughout the entire United States and its territories. The Corps Districts representing West Virginia have imposed regional conditions on the NWP that are applicable throughout the entire state. For convenience, all NWP with the appropriate regional, general and special conditions are attached.

In response to the Federal Register Notice (77 FR 10184), the West Virginia Department of Environmental Protection (WVDEP) has issued 401 water quality certification, pending compliance with certain conditions and/or limitations, for the following NWP: 3, 4, 5, 6, 7, 12, 13, 14, 16, 18, 19, 20, 21, 22, 25, 27, 29, 30, 31, 32, 33, 36, 37, 38, 39, 40, 41, 42, 45, 46, 48, 49, 50 and 51.

An individual State Water Quality Certification is required for the following NWP: 15, 17, 23, 34 and 43. Certification response is not applicable to NWP: 1, 2, 8, 9, 10, 11, 24, 26, 28, 35, 44, 47, and 52.

Authorization for discharges covered by NWP is denied without prejudice if: (1) the State Certification has been denied; or (2) the discharge is not in compliance with conditions imposed in the State Certification. Applicants wishing to conduct such discharges must first obtain either an individual water quality certificate or waiver from:

Director
West Virginia Department of Environmental Protection
601 57th Street
Charleston, West Virginia 25304

Some NWP's require advance notification. The notification must be made in writing as early as possible prior to commencing the proposed activity. The notification procedures are located under General Condition 31. The notification to the Corps can be made concurrently with the request for individual state certification, if required. The District Engineer may require an individual permit for any activity determined to have more than minimal adverse environmental effects, individually or cumulatively, or would be contrary to the public interest.

The NWP's provide a simplified, expeditious means of project authorization under various authorities of the Corps. We encourage prospective permit applicants to consider the advantages of nationwide permit authorization during the preliminary design of their projects. Assistance and further information regarding all aspects of the Corps regulatory program may be obtained by contacting:

HUNTINGTON DISTRICT

Name: Ginger Mullins, Chief, Regulatory Division
Address: U.S. Army Corps of Engineers, Huntington District
502 Eighth Street
Huntington, West Virginia 25701-2070
Phone: 304-399-5710

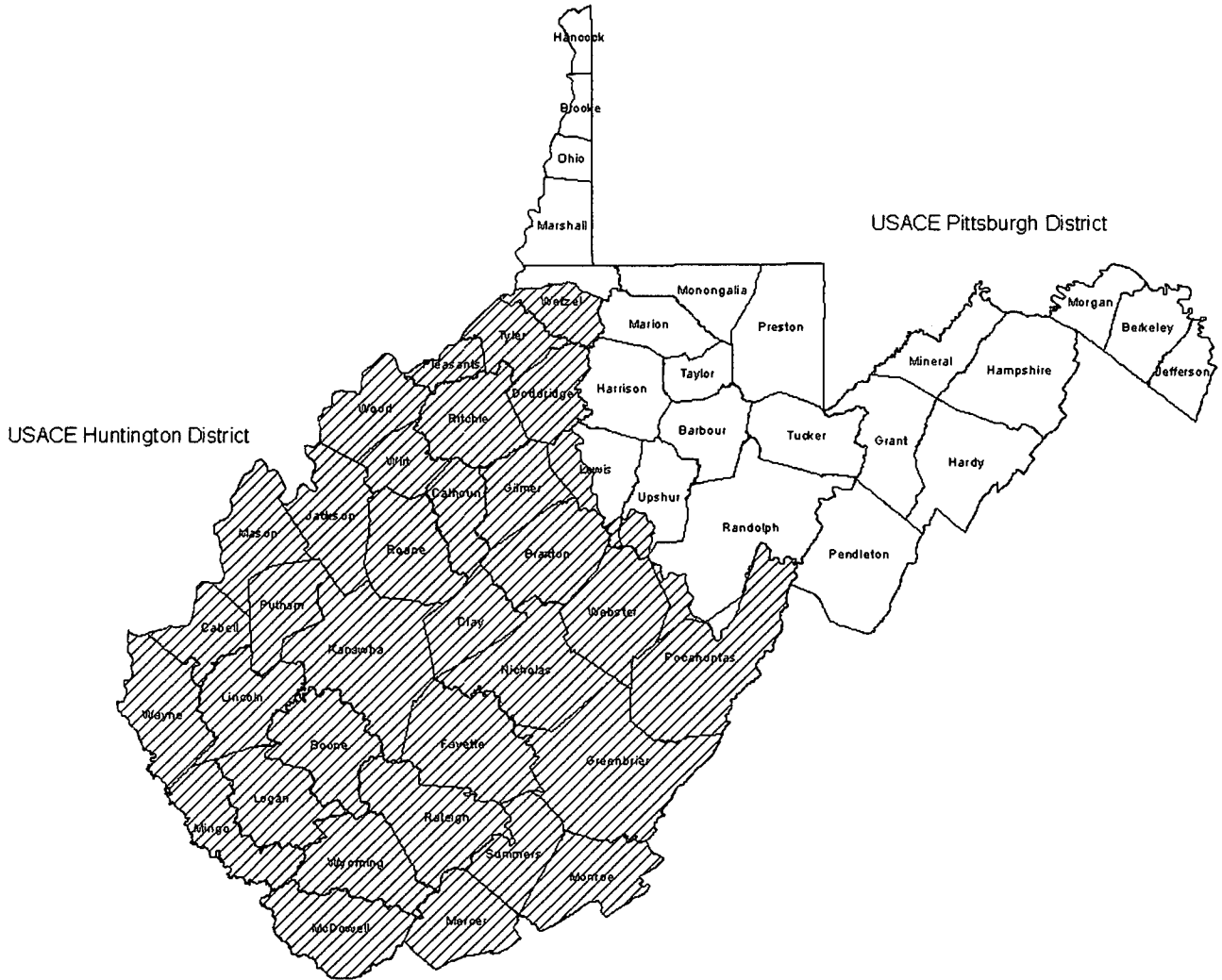
PITTSBURGH DISTRICT

Name: Scott Hans, Chief Regulatory Branch
Address: U.S. Army Corps of Engineers, Pittsburgh District
William S. Moorhead Federal Building
1000 Liberty Avenue
Pittsburgh, Pennsylvania 15222-4186
Phone: 412-395-7154

Attached is a map showing the district boundaries for the State of West Virginia.

Ginger Mullins, Chief
Regulatory Division

Corps Districts and Navigable Streams in The State of West Virginia



Huntington District

1. Ohio River.....Total Length in State
2. Kanawha River.....Total Length
3. New River.....Total Length in State
4. Big Sandy River.....Total Length
5. Tug Fork.....58 Miles
6. Elk River.....139 Miles
7. Gauley River.....75 Miles
8. Guyandotte River.....122 Miles
9. Little Kanawha River.....130.75 Miles
10. Greenbrier River.....150.50 Miles
11. Coal River.....57.90 Miles

Pittsburgh District

1. Ohio River.....Total Length in State
12. Monongahela River.....Total Length in State
13. Tygart River.....7 Miles
14. West Fork.....74 Miles
15. Shenandoah River.....Total Length in State
16. Potomac River.....Total Length in State

A. U.S. Army Corps of Engineers Nationwide Permit #12 for Utility Line Activities in West Virginia

This nationwide permit authorizes activities required for the construction, maintenance, repair, and removal of utility lines and associated facilities in waters of the United States, provided the activity does not result in the loss of greater than 1/2-acre of waters of the United States for each single and complete project.

Utility lines: This NWP authorizes the construction, maintenance, or repair of utility lines, including outfall and intake structures, and the associated excavation, backfill, or bedding for the utility lines, in all waters of the United States, provided there is no change in pre-construction contours. A "utility line" is defined as any pipe or pipeline for the transportation of any gaseous, liquid, liquescent, or slurry substance, for any purpose, and any cable, line, or wire for the transmission for any purpose of electrical energy, telephone, and telegraph messages, and radio and television communication. The term "utility line" does not include activities that drain a water of the United States, such as drainage tile or french drains, but it does apply to pipes conveying drainage from another area.

Material resulting from trench excavation may be temporarily sidecast into waters of the United States for no more than three months, provided the material is not placed in such a manner that it is dispersed by currents or other forces. The district engineer may extend the period of temporary side casting for no more than a total of 180 days, where appropriate. In wetlands, the top 6 to 12 inches of the trench should normally be backfilled with topsoil from the trench. The trench cannot be constructed or backfilled in such a manner as to drain waters of the United States (e.g., backfilling with extensive gravel layers, creating a french drain effect). Any exposed slopes and stream banks must be stabilized immediately upon completion of the utility line crossing of each waterbody.

Utility line substations: This NWP authorizes the construction, maintenance, or expansion of substation facilities associated with a power line or utility line in non-tidal waters of the United States, provided the activity, in combination with all other activities included in one single and complete project, does not result in the loss of greater than 1/2-acre of waters of the United States. This NWP does not authorize discharges into non-tidal wetlands adjacent to tidal waters of the United States to construct, maintain, or expand substation facilities.

Foundations for overhead utility line towers, poles, and anchors: This NWP authorizes the construction or maintenance of foundations for overhead utility line towers, poles, and anchors in all waters of the United States, provided the foundations are the minimum size necessary and separate footings for each tower leg (rather than a larger single pad) are used where feasible.

Access roads: This NWP authorizes the construction of access roads for the construction and maintenance of utility lines, including overhead power lines and utility line substations, in non-tidal waters of the United States, provided the activity, in combination with all other activities included in one single and complete project, does not cause the loss of greater than 1/2-acre of non-tidal waters of the United States. This NWP does not authorize discharges into non-tidal wetlands adjacent to tidal waters for access roads. Access roads must be the minimum width necessary (see Note 2, below). Access roads must be constructed so that the length of the road minimizes any adverse effects on waters of the United States and must be as near as possible to pre-construction contours and elevations (e.g., at grade corduroy roads or geotextile/gravel

roads). Access roads constructed above pre-construction contours and elevations in waters of the United States must be properly bridged or culverted to maintain surface flows.

This NWP may authorize utility lines in or affecting navigable waters of the United States even if there is no associated discharge of dredged or fill material (See 33 CFR Part 322). Overhead utility lines constructed over section 10 waters and utility lines that are routed in or under section 10 waters without a discharge of dredged or fill material require a section 10 permit.

This NWP also authorizes temporary structures, fills, and work necessary to conduct the utility line activity. Appropriate measures must be taken to maintain normal downstream flows and minimize flooding to the maximum extent practicable, when temporary structures, work, and discharges, including cofferdams, are necessary for construction activities, access fills, or dewatering of construction sites. Temporary fills must consist of materials, and be placed in a manner, that will not be eroded by expected high flows. Temporary fills must be removed in their entirety and the affected areas returned to pre-construction elevations. The areas affected by temporary fills must be revegetated, as appropriate.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity if any of the following criteria are met: (1) the activity involves mechanized land clearing in a forested wetland for the utility line right-of-way; (2) a section 10 permit is required; (3) the utility line in waters of the United States, excluding overhead lines, exceeds 500 feet; (4) the utility line is placed within a jurisdictional area (i.e., water of the United States), and it runs parallel to or along a stream bed that is within that jurisdictional area; (5) discharges that result in the loss of greater than 1/10-acre of waters of the United States; (6) permanent access roads are constructed above grade in waters of the United States for a distance of more than 500 feet; or (7) permanent access roads are constructed in waters of the United States with impervious materials. (See general condition 31.) **(Sections 10 and 404)**

Note 1: Where the proposed utility line is constructed or installed in navigable waters of the United States (i.e., section 10 waters) within the coastal United States, the Great Lakes, and United States territories, copies of the pre-construction notification and NWP verification will be sent by the Corps to the National Oceanic and Atmospheric Administration (NOAA), National Ocean Service (NOS), for charting the utility line to protect navigation.

Note 2: Access roads used for both construction and maintenance may be authorized, provided they meet the terms and conditions of this NWP. Access roads used solely for construction of the utility line must be removed upon completion of the work, in accordance with the requirements for temporary fills.

Note 3: Pipes or pipelines used to transport gaseous, liquid, liquescent, or slurry substances over navigable waters of the United States are considered to be bridges, not utility lines, and may require a permit from the U.S. Coast Guard pursuant to Section 9 of the Rivers and Harbors Act of 1899. However, any discharges of dredged or fill material into waters of the United States associated with such pipelines will require a section 404 permit (see NWP 15).

Note 4: For overhead utility lines authorized by this NWP, a copy of the PCN and NWP verification will be provided to the Department of Defense Siting Clearinghouse, which will evaluate potential effects on military activities.

B. Specific Regional Conditions for Nationwide Permit #12:

- For those utility line projects requiring notification, a USGS topographical map shall be provided showing the overall project area identifying beginning and ending termini.
- Notification is required for utility lines not regulated by a State or Federal agency (Federal Energy Regulatory Commission, Public Service District, etc.) or to individual family residences.
- Notification is required for all work in waters of the U.S. associated with the construction of utility line substations.
- Notification is required for all work in streams (perennial, intermittent, and ephemeral) associated with the construction of foundations for overhead utility line towers, poles, and anchors.
- The maximum allowable timeframe for temporary work in waters of the U.S. is limited to one year, unless the permittee receives prior written approval from the Corps of Engineers granting a time extension.
- Notification for aerial transmission lines over Section 10 waters must include the nominal system voltage and the additional clearance above low steel for bridges, if available, or above maximum high water elevation.
- Note: All aerial crossings will have the following minimum clearances above the clearance required for bridges, or the clearances which would be required by the U.S. Coast Guard for new fixed bridges, in the vicinity of the proposed crossing. These clearances are based on the low point of the line under conditions which produce the greatest sag, taking into consideration temperature, load, wind, length or span, and type of supports as outline in the Nation Electrical Safety Code. **For any non-electrical cable, the crossing must have a minimum clearance of 20 feet above the clearance required for bridges.**

<u>NOMINAL SYSTEM VOLTAGE, KV</u>	<u>ADDITIONAL CLEARANCE, FEET</u>
115 and below	20
138	22
161	24
230	26
350	30
500	35
700	42
750-765	45

C. West Virginia 401 Water Quality Certification Special Conditions for Nationwide Permit #12:

For activities involving a discharge, the West Virginia 401 Water Quality Certification Standard Conditions apply.

- A. Points of ingress and egress to streams for equipment shall be within the work site. Location of ingress and egress outside the immediate work area requires prior approval of

the West Virginia Department of Environmental Protection Division of Water and Waste Management with concurrence from the West Virginia Division of Natural Resources.

- B.** Certification is limited to pipelines 36 inches or less in diameter. Individual stream crossings must be completed in a continuous, progressive manner and within 72 hours under normal (normal or below stream flow) conditions. Crossings on the Ohio, Kanawha, New and Monongahela Rivers and the Little Kanawha River, below the confluence with Hughes Rivers, are exempt from the 72-hour requirements, as are stream crossings requiring blasting. Whatever the situation, all stream activities shall be conducted in a continuous, progressive manner and be completed as rapidly as possible.
- C.** Shoreline restoration will be completed and stabilized in accordance with standard condition 5. Equipment tracking in wetlands will utilize protective mats when practical. Restoration of the disturbed areas will be completed within 72 hours of the completion of pipeline installation across the watercourse.
- D.** Surface disturbance will not extend beyond the right-of-way limits. Stream crossings will be conducted as close to a right angle to the watercourse as practical and the area of disturbance will be limited to reduce in stream activity.
- E.** Dredging for backfill material is not allowed.
- F.** Submarine-type pipeline crossings must be designed and constructed to prevent flotation and the possibility of leakage or rupture and the top of pipelines must be buried a minimum of three (3) feet below the stream bottom.
- G.** Where it is apparent that small boats, inner tubes, swimmers, etc. could be using the stream in the work area, easily seen warning signs must be placed a minimum of 50 feet upstream and downstream of the stream crossings construction site to advise stream users of the potential danger.
- H.** Individual State Water Quality Certification is required for pipelines transporting hazardous materials/substances as defined by the Toxic Substances Control Act, except pipelines carrying natural gas are exempt from this condition.
- I.** Individual State Water Quality Certification is required for utility lines within wetlands that would use or consider the use of herbicides for right-of-way maintenance.
- J.** Written notification to the Director of the Division of Water and Waste Management detailing the amount of water to be withdrawn by the intake structures is required. The proposed water withdrawal notification shall include sufficient detail to allow the resource agencies to determine if the proposed water withdrawal will have minimal impacts on aquatic resources.

- K. Individual State Water Quality Certification is required for an activity impacting greater than 200 linear feet on one or more of the streams listed in West Virginia State Certification, Standard Condition 15.
- L. Individual State Water Quality Certification is required for perennial and intermittent stream impacts greater than 300 linear feet.
- M. No structure authorized by this permit shall entrain or impinge fish or any other aquatic life or impede or prevent fish movement upstream or downstream without specific written authorization from the West Virginia Department of Environmental Protection, Division of Water and Waste Management with concurrence from West Virginia Division of Natural Resources.

D. U.S. Army Corps of Engineers Nationwide Permit General Conditions Applicable to ALL NWP

Note: To qualify for NWP authorization, the prospective permittee must comply with the following general conditions, as applicable, in addition to any regional or case-specific conditions imposed by the division engineer or district engineer. Prospective permittees should contact the appropriate Corps district office to determine if regional conditions have been imposed on an NWP. Prospective permittees should also contact the appropriate Corps district office to determine the status of Clean Water Act Section 401 water quality certification and/or Coastal Zone Management Act consistency for an NWP. Every person who may wish to obtain permit authorization under one or more NWPs, or who is currently relying on an existing or prior permit authorization under one or more NWPs, has been and is on notice that all of the provisions of 33 CFR §§ 330.1 through 330.6 apply to every NWP authorization. Note especially 33 CFR § 330.5 relating to the modification, suspension, or revocation of any NWP authorization.

1. Navigation. (a) No activity may cause more than a minimal adverse effect on navigation.

(b) Any safety lights and signals prescribed by the U.S. Coast Guard, through regulations or otherwise, must be installed and maintained at the permittee's expense on authorized facilities in navigable waters of the United States.

(c) The permittee understands and agrees that, if future operations by the United States require the removal, relocation, or other alteration, of the structure or work herein authorized, or if, in the opinion of the Secretary of the Army or his authorized representative, said structure or work shall cause unreasonable obstruction to the free navigation of the navigable waters, the permittee will be required, upon due notice from the Corps of Engineers, to remove, relocate, or alter the structural work or obstructions caused thereby, without expense to the United States. No claim shall be made against the United States on account of any such removal or alteration.

2. Aquatic Life Movements. No activity may substantially disrupt the necessary life cycle movements of those species of aquatic life indigenous to the waterbody, including those species that normally migrate through the area, unless the activity's primary purpose is to impound water. All permanent and temporary crossings of waterbodies shall be suitably

culverted, bridged, or otherwise designed and constructed to maintain low flows to sustain the movement of those aquatic species.

3. Spawning Areas. Activities in spawning areas during spawning seasons must be avoided to the maximum extent practicable. Activities that result in the physical destruction (e.g., through excavation, fill, or downstream smothering by substantial turbidity) of an important spawning area are not authorized.

4. Migratory Bird Breeding Areas. Activities in waters of the United States that serve as breeding areas for migratory birds must be avoided to the maximum extent practicable.

5. Shellfish Beds. No activity may occur in areas of concentrated shellfish populations, unless the activity is directly related to a shellfish harvesting activity authorized by NWP 4 and 48, or is a shellfish seeding or habitat restoration activity authorized by NWP 27.

6. Suitable Material. No activity may use unsuitable material (e.g., trash, debris, car bodies, asphalt, etc.). Material used for construction or discharged must be free from toxic pollutants in toxic amounts (see Section 307 of the Clean Water Act).

7. Water Supply Intakes. No activity may occur in the proximity of a public water supply intake, except where the activity is for the repair or improvement of public water supply intake structures or adjacent bank stabilization.

8. Adverse Effects From Impoundments. If the activity creates an impoundment of water, adverse effects to the aquatic system due to accelerating the passage of water, and/or restricting its flow must be minimized to the maximum extent practicable.

9. Management of Water Flows. To the maximum extent practicable, the pre-construction course, condition, capacity, and location of open waters must be maintained for each activity, including stream channelization and storm water management activities, except as provided below. The activity must be constructed to withstand expected high flows. The activity must not restrict or impede the passage of normal or high flows, unless the primary purpose of the activity is to impound water or manage high flows. The activity may alter the pre-construction course, condition, capacity, and location of open waters if it benefits the aquatic environment (e.g., stream restoration or relocation activities).

10. Fills Within 100-Year Floodplains. The activity must comply with applicable FEMA-approved state or local floodplain management requirements.

11. Equipment. Heavy equipment working in wetlands or mudflats must be placed on mats, or other measures must be taken to minimize soil disturbance.

12. Soil Erosion and Sediment Controls. Appropriate soil erosion and sediment controls must be used and maintained in effective operating condition during construction, and all exposed soil and other fills, as well as any work below the ordinary high water mark or high tide line, must be permanently stabilized at the earliest practicable date. Permittees are

encouraged to perform work within waters of the United States during periods of low-flow or no-flow.

13. Removal of Temporary Fills. Temporary fills must be removed in their entirety and the affected areas returned to pre-construction elevations. The affected areas must be revegetated, as appropriate.

14. Proper Maintenance. Any authorized structure or fill shall be properly maintained, including maintenance to ensure public safety and compliance with applicable NWP general conditions, as well as any activity-specific conditions added by the district engineer to an NWP authorization.

15. Single and Complete Project. The activity must be a single and complete project. The same NWP cannot be used more than once for the same single and complete project.

16. Wild and Scenic Rivers. No activity may occur in a component of the National Wild and Scenic River System, or in a river officially designated by Congress as a "study river" for possible inclusion in the system while the river is in an official study status, unless the appropriate Federal agency with direct management responsibility for such river, has determined in writing that the proposed activity will not adversely affect the Wild and Scenic River designation or study status. Information on Wild and Scenic Rivers may be obtained from the appropriate Federal land management agency responsible for the designated Wild and Scenic River or study river (e.g., National Park Service, U.S. Forest Service, Bureau of Land Management, U.S. Fish and Wildlife Service).

17. Tribal Rights. No activity or its operation may impair reserved tribal rights, including, but not limited to, reserved water rights and treaty fishing and hunting rights.

18. Endangered Species. (a) No activity is authorized under any NWP which is likely to directly or indirectly jeopardize the continued existence of a threatened or endangered species or a species proposed for such designation, as identified under the Federal Endangered Species Act (ESA), or which will directly or indirectly destroy or adversely modify the critical habitat of such species. No activity is authorized under any NWP which "may affect" a listed species or critical habitat, unless Section 7 consultation addressing the effects of the proposed activity has been completed.

(b) Federal agencies should follow their own procedures for complying with the requirements of the ESA. Federal permittees must provide the district engineer with the appropriate documentation to demonstrate compliance with those requirements. The district engineer will review the documentation and determine whether it is sufficient to address ESA compliance for the NWP activity, or whether additional ESA consultation is necessary.

(c) Non-federal permittees must submit a pre-construction notification to the district engineer if any listed species or designated critical habitat might be affected or is in the vicinity of the project, or if the project is located in designated critical habitat, and shall not begin work on the activity until notified by the district engineer that the requirements of the ESA have been satisfied and that the activity is authorized. For activities that might affect Federally-listed endangered or threatened species or designated critical habitat, the pre-construction notification must include the name(s) of the endangered or threatened species that might be affected by the

proposed work or that utilize the designated critical habitat that might be affected by the proposed work. The district engineer will determine whether the proposed activity "may affect" or will have "no effect" to listed species and designated critical habitat and will notify the non-Federal applicant of the Corps' determination within 45 days of receipt of a complete pre-construction notification. In cases where the non-Federal applicant has identified listed species or critical habitat that might be affected or is in the vicinity of the project, and has so notified the Corps, the applicant shall not begin work until the Corps has provided notification the proposed activities will have "no effect" on listed species or critical habitat, or until Section 7 consultation has been completed. If the non-Federal applicant has not heard back from the Corps within 45 days, the applicant must still wait for notification from the Corps.

(d) As a result of formal or informal consultation with the FWS or NMFS the district engineer may add species-specific regional endangered species conditions to the NWP.

(e) Authorization of an activity by a NWP does not authorize the "take" of a threatened or endangered species as defined under the ESA. In the absence of separate authorization (e.g., an ESA Section 10 Permit, a Biological Opinion with "incidental take" provisions, etc.) from the U.S. FWS or the NMFS, The Endangered Species Act prohibits any person subject to the jurisdiction of the United States to take a listed species, where "take" means to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or to attempt to engage in any such conduct. The word "harm" in the definition of "take" means an act which actually kills or injures wildlife. Such an act may include significant habitat modification or degradation where it actually kills or injures wildlife by significantly impairing essential behavioral patterns, including breeding, feeding or sheltering.

(f) Information on the location of threatened and endangered species and their critical habitat can be obtained directly from the offices of the U.S. FWS and NMFS or their world wide web pages at <http://www.fws.gov/> or <http://www.fws.gov/ipac> and <http://www.noaa.gov/fisheries.html> respectively.

19. Migratory Birds and Bald and Golden Eagles. The permittee is responsible for obtaining any "take" permits required under the U.S. Fish and Wildlife Service's regulations governing compliance with the Migratory Bird Treaty Act or the Bald and Golden Eagle Protection Act. The permittee should contact the appropriate local office of the U.S. Fish and Wildlife Service to determine if such "take" permits are required for a particular activity.

20. Historic Properties. (a) In cases where the district engineer determines that the activity may affect properties listed, or eligible for listing, in the National Register of Historic Places, the activity is not authorized, until the requirements of Section 106 of the National Historic Preservation Act (NHPA) have been satisfied.

(b) Federal permittees should follow their own procedures for complying with the requirements of Section 106 of the National Historic Preservation Act. Federal permittees must provide the district engineer with the appropriate documentation to demonstrate compliance with those requirements. The district engineer will review the documentation and determine whether it is sufficient to address section 106 compliance for the NWP activity, or whether additional section 106 consultation is necessary.

(c) Non-federal permittees must submit a pre-construction notification to the district engineer if the authorized activity may have the potential to cause effects to any historic properties listed on, determined to be eligible for listing on, or potentially eligible for listing on

the National Register of Historic Places, including previously unidentified properties. For such activities, the pre-construction notification must state which historic properties may be affected by the proposed work or include a vicinity map indicating the location of the historic properties or the potential for the presence of historic properties. Assistance regarding information on the location of or potential for the presence of historic resources can be sought from the State Historic Preservation Officer or Tribal Historic Preservation Officer, as appropriate, and the National Register of Historic Places (see 33 CFR 330.4(g)). When reviewing pre-construction notifications, district engineers will comply with the current procedures for addressing the requirements of Section 106 of the National Historic Preservation Act. The district engineer shall make a reasonable and good faith effort to carry out appropriate identification efforts, which may include background research, consultation, oral history interviews, sample field investigation, and field survey. Based on the information submitted and these efforts, the district engineer shall determine whether the proposed activity has the potential to cause an effect on the historic properties. Where the non-Federal applicant has identified historic properties on which the activity may have the potential to cause effects and so notified the Corps, the non-Federal applicant shall not begin the activity until notified by the district engineer either that the activity has no potential to cause effects or that consultation under Section 106 of the NHPA has been completed.

(d) The district engineer will notify the prospective permittee within 45 days of receipt of a complete pre-construction notification whether NHPA Section 106 consultation is required. Section 106 consultation is not required when the Corps determines that the activity does not have the potential to cause effects on historic properties (see 36 CFR §800.3(a)). If NHPA section 106 consultation is required and will occur, the district engineer will notify the non-Federal applicant that he or she cannot begin work until Section 106 consultation is completed. If the non-Federal applicant has not heard back from the Corps within 45 days, the applicant must still wait for notification from the Corps.

(e) Prospective permittees should be aware that section 110k of the NHPA (16 U.S.C. 470h-2(k)) prevents the Corps from granting a permit or other assistance to an applicant who, with intent to avoid the requirements of Section 106 of the NHPA, has intentionally significantly adversely affected a historic property to which the permit would relate, or having legal power to prevent it, allowed such significant adverse effect to occur, unless the Corps, after consultation with the Advisory Council on Historic Preservation (ACHP), determines that circumstances justify granting such assistance despite the adverse effect created or permitted by the applicant. If circumstances justify granting the assistance, the Corps is required to notify the ACHP and provide documentation specifying the circumstances, the degree of damage to the integrity of any historic properties affected, and proposed mitigation. This documentation must include any views obtained from the applicant, SHPO/THPO, appropriate Indian tribes if the undertaking occurs on or affects historic properties on tribal lands or affects properties of interest to those tribes, and other parties known to have a legitimate interest in the impacts to the permitted activity on historic properties.

21. Discovery of Previously Unknown Remains and Artifacts. If you discover any previously unknown historic, cultural or archeological remains and artifacts while accomplishing the activity authorized by this permit, you must immediately notify the district engineer of what you have found, and to the maximum extent practicable, avoid construction activities that may affect the remains and artifacts until the required coordination has been completed. The district

engineer will initiate the Federal, Tribal and state coordination required to determine if the items or remains warrant a recovery effort or if the site is eligible for listing in the National Register of Historic Places.

22. Designated Critical Resource Waters. Critical resource waters include, NOAA-managed marine sanctuaries and marine monuments, and National Estuarine Research Reserves. The district engineer may designate, after notice and opportunity for public comment, additional waters officially designated by a state as having particular environmental or ecological significance, such as outstanding national resource waters or state natural heritage sites. The district engineer may also designate additional critical resource waters after notice and opportunity for public comment.

(a) Discharges of dredged or fill material into waters of the United States are not authorized by NWPs 7, 12, 14, 16, 17, 21, 29, 31, 35, 39, 40, 42, 43, 44, 49, 50, 51, and 52 for any activity within, or directly affecting, critical resource waters, including wetlands adjacent to such waters.

(b) For NWPs 3, 8, 10, 13, 15, 18, 19, 22, 23, 25, 27, 28, 30, 33, 34, 36, 37, and 38, notification is required in accordance with general condition 31, for any activity proposed in the designated critical resource waters including wetlands adjacent to those waters. The district engineer may authorize activities under these NWPs only after it is determined that the impacts to the critical resource waters will be no more than minimal.

23. Mitigation. The district engineer will consider the following factors when determining appropriate and practicable mitigation necessary to ensure that adverse effects on the aquatic environment are minimal:

(a) The activity must be designed and constructed to avoid and minimize adverse effects, both temporary and permanent, to waters of the United States to the maximum extent practicable at the project site (i.e., on site).

(b) Mitigation in all its forms (avoiding, minimizing, rectifying, reducing, or compensating for resource losses) will be required to the extent necessary to ensure that the adverse effects to the aquatic environment are minimal.

(c) Compensatory mitigation at a minimum one-for-one ratio will be required for all wetland losses that exceed 1/10-acre and require pre-construction notification, unless the district engineer determines in writing that either some other form of mitigation would be more environmentally appropriate or the adverse effects of the proposed activity are minimal, and provides a project-specific waiver of this requirement. For wetland losses of 1/10-acre or less that require pre-construction notification, the district engineer may determine on a case-by-case basis that compensatory mitigation is required to ensure that the activity results in minimal adverse effects on the aquatic environment. Compensatory mitigation projects provided to offset losses of aquatic resources must comply with the applicable provisions of 33 CFR part 332.

(1) The prospective permittee is responsible for proposing an appropriate compensatory mitigation option if compensatory mitigation is necessary to ensure that the activity results in minimal adverse effects on the aquatic environment.

(2) Since the likelihood of success is greater and the impacts to potentially valuable uplands are reduced, wetland restoration should be the first compensatory mitigation option considered.

(3) If permittee-responsible mitigation is the proposed option, the prospective permittee is responsible for submitting a mitigation plan. A conceptual or detailed mitigation plan may be used by the district engineer to make the decision on the NWP verification request, but a final mitigation plan that addresses the applicable requirements of 33 CFR 332.4(c)(2) – (14) must be approved by the district engineer before the permittee begins work in waters of the United States, unless the district engineer determines that prior approval of the final mitigation plan is not practicable or not necessary to ensure timely completion of the required compensatory mitigation (see 33 CFR 332.3(k)(3)).

(4) If mitigation bank or in-lieu fee program credits are the proposed option, the mitigation plan only needs to address the baseline conditions at the impact site and the number of credits to be provided.

(5) Compensatory mitigation requirements (e.g., resource type and amount to be provided as compensatory mitigation, site protection, ecological performance standards, monitoring requirements) may be addressed through conditions added to the NWP authorization, instead of components of a compensatory mitigation plan.

(d) For losses of streams or other open waters that require pre-construction notification, the district engineer may require compensatory mitigation, such as stream rehabilitation, enhancement, or preservation, to ensure that the activity results in minimal adverse effects on the aquatic environment.

(e) Compensatory mitigation will not be used to increase the acreage losses allowed by the acreage limits of the NWPs. For example, if an NWP has an acreage limit of 1/2-acre, it cannot be used to authorize any project resulting in the loss of greater than 1/2-acre of waters of the United States, even if compensatory mitigation is provided that replaces or restores some of the lost waters. However, compensatory mitigation can and should be used, as necessary, to ensure that a project already meeting the established acreage limits also satisfies the minimal impact requirement associated with the NWPs.

(f) Compensatory mitigation plans for projects in or near streams or other open waters will normally include a requirement for the restoration or establishment, maintenance, and legal protection (e.g., conservation easements) of riparian areas next to open waters. In some cases, riparian areas may be the only compensatory mitigation required. Riparian areas should consist of native species. The width of the required riparian area will address documented water quality or aquatic habitat loss concerns. Normally, the riparian area will be 25 to 50 feet wide on each side of the stream, but the district engineer may require slightly wider riparian areas to address documented water quality or habitat loss concerns. If it is not possible to establish a riparian area on both sides of a stream, or if the waterbody is a lake or coastal waters, then restoring or establishing a riparian area along a single bank or shoreline may be sufficient. Where both wetlands and open waters exist on the project site, the district engineer will determine the appropriate compensatory mitigation (e.g., riparian areas and/or wetlands compensation) based on what is best for the aquatic environment on a watershed basis. In cases where riparian areas are determined to be the most appropriate form of compensatory mitigation, the district engineer may waive or reduce the requirement to provide wetland compensatory mitigation for wetland losses.

(g) Permittees may propose the use of mitigation banks, in-lieu fee programs, or separate permittee-responsible mitigation. For activities resulting in the loss of marine or estuarine resources, permittee-responsible compensatory mitigation may be environmentally preferable if there are no mitigation banks or in-lieu fee programs in the area that have marine or estuarine

credits available for sale or transfer to the permittee. For permittee-responsible mitigation, the special conditions of the NWP verification must clearly indicate the party or parties responsible for the implementation and performance of the compensatory mitigation project, and, if required, its long-term management.

(h) Where certain functions and services of waters of the United States are permanently adversely affected, such as the conversion of a forested or scrub-shrub wetland to a herbaceous wetland in a permanently maintained utility line right-of-way, mitigation may be required to reduce the adverse effects of the project to the minimal level.

24. Safety of Impoundment Structures. To ensure that all impoundment structures are safely designed, the district engineer may require non-Federal applicants to demonstrate that the structures comply with established state dam safety criteria or have been designed by qualified persons. The district engineer may also require documentation that the design has been independently reviewed by similarly qualified persons, and appropriate modifications made to ensure safety.

25. Water Quality. Where States and authorized Tribes, or EPA where applicable, have not previously certified compliance of an NWP with CWA Section 401, individual 401 Water Quality Certification must be obtained or waived (see 33 CFR 330.4(c)). The district engineer or State or Tribe may require additional water quality management measures to ensure that the authorized activity does not result in more than minimal degradation of water quality.

26. Coastal Zone Management. In coastal states where an NWP has not previously received a state coastal zone management consistency concurrence, an individual state coastal zone management consistency concurrence must be obtained, or a presumption of concurrence must occur (see 33 CFR 330.4(d)). The district engineer or a State may require additional measures to ensure that the authorized activity is consistent with state coastal zone management requirements.

27. Regional and Case-By-Case Conditions. The activity must comply with any regional conditions that may have been added by the Division Engineer (see 33 CFR 330.4(e)) and with any case specific conditions added by the Corps or by the state, Indian Tribe, or U.S. EPA in its section 401 Water Quality Certification, or by the state in its Coastal Zone Management Act consistency determination.

28. Use of Multiple Nationwide Permits. The use of more than one NWP for a single and complete project is prohibited, except when the acreage loss of waters of the United States authorized by the NWPs does not exceed the acreage limit of the NWP with the highest specified acreage limit. For example, if a road crossing over tidal waters is constructed under NWP 14, with associated bank stabilization authorized by NWP 13, the maximum acreage loss of waters of the United States for the total project cannot exceed 1/3-acre.

29. Transfer of Nationwide Permit Verifications. If the permittee sells the property associated with a nationwide permit verification, the permittee may transfer the nationwide permit verification to the new owner by submitting a letter to the appropriate Corps district office

to validate the transfer. A copy of the nationwide permit verification must be attached to the letter, and the letter must contain the following statement and signature:

“When the structures or work authorized by this nationwide permit are still in existence at the time the property is transferred, the terms and conditions of this nationwide permit, including any special conditions, will continue to be binding on the new owner(s) of the property. To validate the transfer of this nationwide permit and the associated liabilities associated with compliance with its terms and conditions, have the transferee sign and date below.”

(Transferee)

(Date)

30. Compliance Certification. Each permittee who receives an NWP verification letter from the Corps must provide a signed certification documenting completion of the authorized activity and any required compensatory mitigation. The success of any required permittee-responsible mitigation, including the achievement of ecological performance standards, will be addressed separately by the district engineer. The Corps will provide the permittee the certification document with the NWP verification letter. The certification document will include:

- (a) A statement that the authorized work was done in accordance with the NWP authorization, including any general, regional, or activity-specific conditions;
- (b) A statement that the implementation of any required compensatory mitigation was completed in accordance with the permit conditions. If credits from a mitigation bank or in-lieu fee program are used to satisfy the compensatory mitigation requirements, the certification must include the documentation required by 33 CFR 332.3(1)(3) to confirm that the permittee secured the appropriate number and resource type of credits; and
- (c) The signature of the permittee certifying the completion of the work and mitigation.

31. Pre-Construction Notification. (a) Timing. Where required by the terms of the NWP, the prospective permittee must notify the district engineer by submitting a pre-construction notification (PCN) as early as possible. The district engineer must determine if the PCN is complete within 30 calendar days of the date of receipt and, if the PCN is determined to be incomplete, notify the prospective permittee within that 30 day period to request the additional information necessary to make the PCN complete. The request must specify the information needed to make the PCN complete. As a general rule, district engineers will request additional information necessary to make the PCN complete only once. However, if the prospective permittee does not provide all of the requested information, then the district engineer will notify the prospective permittee that the PCN is still incomplete and the PCN review process will not commence until all of the requested information has been received by the district engineer. The prospective permittee shall not begin the activity until either:

- (1) He or she is notified in writing by the district engineer that the activity may proceed under the NWP with any special conditions imposed by the district or division engineer; or
- (2) 45 calendar days have passed from the district engineer's receipt of the complete PCN and the prospective permittee has not received written notice from the district or division

engineer. However, if the permittee was required to notify the Corps pursuant to general condition 18 that listed species or critical habitat might be affected or in the vicinity of the project, or to notify the Corps pursuant to general condition 20 that the activity may have the potential to cause effects to historic properties, the permittee cannot begin the activity until receiving written notification from the Corps that there is "no effect" on listed species or "no potential to cause effects" on historic properties, or that any consultation required under Section 7 of the Endangered Species Act (see 33 CFR 330.4(f)) and/or Section 106 of the National Historic Preservation (see 33 CFR 330.4(g)) has been completed. Also, work cannot begin under NWP 21, 49, or 50 until the permittee has received written approval from the Corps. If the proposed activity requires a written waiver to exceed specified limits of an NWP, the permittee may not begin the activity until the district engineer issues the waiver. If the district or division engineer notifies the permittee in writing that an individual permit is required within 45 calendar days of receipt of a complete PCN, the permittee cannot begin the activity until an individual permit has been obtained. Subsequently, the permittee's right to proceed under the NWP may be modified, suspended, or revoked only in accordance with the procedure set forth in 33 CFR 330.5(d)(2).

(b) Contents of Pre-Construction Notification: The PCN must be in writing and include the following information:

- (1)** Name, address and telephone numbers of the prospective permittee;
- (2)** Location of the proposed project;
- (3)** A description of the proposed project; the project's purpose; direct and indirect adverse environmental effects the project would cause, including the anticipated amount of loss of water of the United States expected to result from the NWP activity, in acres, linear feet, or other appropriate unit of measure; any other NWP(s), regional general permit(s), or individual permit(s) used or intended to be used to authorize any part of the proposed project or any related activity. The description should be sufficiently detailed to allow the district engineer to determine that the adverse effects of the project will be minimal and to determine the need for compensatory mitigation. Sketches should be provided when necessary to show that the activity complies with the terms of the NWP. (Sketches usually clarify the project and when provided results in a quicker decision. Sketches should contain sufficient detail to provide an illustrative description of the proposed activity (e.g., a conceptual plan), but do not need to be detailed engineering plans);
- (4)** The PCN must include a delineation of wetlands, other special aquatic sites, and other waters, such as lakes and ponds, and perennial, intermittent, and ephemeral streams, on the project site. Wetland delineations must be prepared in accordance with the current method required by the Corps. The permittee may ask the Corps to delineate the special aquatic sites and other waters on the project site, but there may be a delay if the Corps does the delineation, especially if the project site is large or contains many waters of the United States. Furthermore, the 45 day period will not start until the delineation has been submitted to or completed by the Corps, as appropriate;
- (5)** If the proposed activity will result in the loss of greater than 1/10-acre of wetlands and a PCN is required, the prospective permittee must submit a statement describing how the mitigation requirement will be satisfied, or explaining why the adverse effects are minimal and why compensatory mitigation should not be required. As an alternative, the prospective permittee may submit a conceptual or detailed mitigation plan.

(6) If any listed species or designated critical habitat might be affected or is in the vicinity of the project, or if the project is located in designated critical habitat, for non-Federal applicants the PCN must include the name(s) of those endangered or threatened species that might be affected by the proposed work or utilize the designated critical habitat that may be affected by the proposed work. Federal applicants must provide documentation demonstrating compliance with the Endangered Species Act; and

(7) For an activity that may affect a historic property listed on, determined to be eligible for listing on, or potentially eligible for listing on, the National Register of Historic Places, for non-Federal applicants the PCN must state which historic property may be affected by the proposed work or include a vicinity map indicating the location of the historic property. Federal applicants must provide documentation demonstrating compliance with Section 106 of the National Historic Preservation Act.

(c) Form of Pre-Construction Notification: The standard individual permit application form (Form ENG 4345) may be used, but the completed application form must clearly indicate that it is a PCN and must include all of the information required in paragraphs (b)(1) through (7) of this general condition. A letter containing the required information may also be used.

(d) Agency Coordination: (1) The district engineer will consider any comments from Federal and state agencies concerning the proposed activity's compliance with the terms and conditions of the NWP's and the need for mitigation to reduce the project's adverse environmental effects to a minimal level.

(2) For all NWP activities that require pre-construction notification and result in the loss of greater than 1/2-acre of waters of the United States, for NWP 21, 29, 39, 40, 42, 43, 44, 50, 51, and 52 activities that require pre-construction notification and will result in the loss of greater than 300 linear feet of intermittent and ephemeral stream bed, and for all NWP 48 activities that require pre-construction notification, the district engineer will immediately provide (e.g., via e-mail, facsimile transmission, overnight mail, or other expeditious manner) a copy of the complete PCN to the appropriate Federal or state offices (U.S. FWS, state natural resource or water quality agency, EPA, State Historic Preservation Officer (SHPO) or Tribal Historic Preservation Office (THPO), and, if appropriate, the NMFS). With the exception of NWP 37, these agencies will have 10 calendar days from the date the material is transmitted to telephone or fax the district engineer notice that they intend to provide substantive, site-specific comments. The comments must explain why the agency believes the adverse effects will be more than minimal. If so contacted by an agency, the district engineer will wait an additional 15 calendar days before making a decision on the pre-construction notification. The district engineer will fully consider agency comments received within the specified time frame concerning the proposed activity's compliance with the terms and conditions of the NWP's, including the need for mitigation to ensure the net adverse environmental effects to the aquatic environment of the proposed activity are minimal. The district engineer will provide no response to the resource agency, except as provided below. The district engineer will indicate in the administrative record associated with each pre-construction notification that the resource agencies' concerns were considered. For NWP 37, the emergency watershed protection and rehabilitation activity may proceed immediately in cases where there is an unacceptable hazard to life or a significant loss of property or economic hardship will occur. The district engineer will consider any comments received to decide whether the NWP 37 authorization should be modified, suspended, or revoked in accordance with the procedures at 33 CFR 330.5.

(3) In cases of where the prospective permittee is not a Federal agency, the district engineer will provide a response to NMFS within 30 calendar days of receipt of any Essential Fish Habitat conservation recommendations, as required by Section 305(b)(4)(B) of the Magnuson-Stevens Fishery Conservation and Management Act.

(4) Applicants are encouraged to provide the Corps with either electronic files or multiple copies of pre-construction notifications to expedite agency coordination.

E. Regional General Conditions

Regional General Condition 1

Full Agency Pre-construction Notification: In an effort to expedite full agency permit review it is requested that all pre-construction notifications (PCNs) submitted for activities requesting a waiver and for those activities resulting in the loss of greater than ½ acre of waters of the United States (U.S.), include one original hard copy and five (5) additional copies of the PCN package. Applicants are encouraged to submit the five agency copies in electronic format as CDs, in order to minimize the use of paper and postage resources.

Regional General Condition 2

Pre-Construction Notification Submittals: In addition to the PCN requirements listed in NWP General Condition 31, all PCNs should include the following information:

- Graphic illustrations on 8 1/2" x 11" paper. The illustrations must clearly depict the project boundaries, including all elements and phases of the proposed project. Three types of illustrations are needed to properly depict the work to be undertaken. These illustrations or drawings are identified as a Vicinity Map {a location map such as the U.S. Geological Survey (USGS) 7.5 Minute Series topographical map is highly encouraged}, a Plan View and a Typical Cross-Section Map. Each illustration should identify the project, the applicant, and the type of illustration (vicinity map, plan view or cross-section). In addition, each illustration should be identified with a figure or attachment number and the project Latitude and Longitude.
- A written description of the proposed project including acreage(s) of waters of the U.S. (according to aquatic resource type) proposed to be directly or indirectly affected as a result of the proposed project, the linear footage of proposed direct and indirect stream impacts associated with the project, and cubic yards of fill proposed to be discharged.
- A description of the ways in which the project has been designed to avoid and minimize adverse impacts to waters of the U.S.
- Information concerning whether the proposed activity would affect any historic properties listed, determined to be eligible, or which they have reason to believe may be eligible, for listing on the National Register of Historic Places.
- Basic information about the general project area (encompassing a search radius of 2 miles

centered on the project area) including USGS 7.5' series topographic maps, National Register of Historic Places (NRHP) files including Historic Districts, and county atlases, histories and/or any historic USGS 15' series topographic map(s), brief description of the terrain and topography of the project area, acreage of the project area, proximity of the project area to major waterways, past land uses in the project area, and any past cultural resources studies or coordination for the project area, if available, along with photographs, keyed to mapping, showing the project area and any buildings or structures on adjacent parcels.

- The submittal of ground photographs to illustrate current conditions of the overall project site and impact site is highly encouraged.

Regional General Condition 3

Compensatory Mitigation: Compensatory mitigation will typically be required as indicated in accordance the terms and conditions of the NWP's in addition to all General and Regional conditions for projects with impacts that result in the conversion of a water of the U.S. to uplands or the conversion of one aquatic resource type to another.

Regional General Condition 4

Passage of Aquatic Life: Culverted crossings should be sized in a manner that allow the passage of aquatic life and freely pass bankfull flows. The only exception to this requirement would involve culvert placement in bedrock and/or extremely high gradient streams, in which countersinking of culverts is determined not to be practicable. In the event proposed crossings do not meet these criteria, compensatory mitigation may be required.

Regional General Condition 5

Endangered Species: Federally listed endangered species, subject to Section 7 of the Endangered Species Act, are located in nearly every county within West Virginia. As part of the PCN process, the district engineer (DE) will assume responsibility for determining project-related effects to endangered species. For projects that do not require a PCN, it is the applicant's responsibility to ensure that all elements of a proposed single and complete project comply with Section 7 of the Endangered Species Act.

Regional General Condition 6

Endangered Species Habitat: Due to the potential presence of endangered species or their habitats applicants are required to provide notification to the U.S. Fish and Wildlife Service Elkins Field Office, 694 Beverly Pike, Elkins, West Virginia 26241, for any work in the waterways listed in Appendix A. This appendix will be update as new species are listed by the U.S. Fish and Wildlife Service.

Regional General Condition 7

All PCNs involving work in the below listed waters require notification to the National Park Service and/or the Forest Service.

- New River;
- Bluestone River from the upstream boundary of Pipestem Park to Bluestone Reservoir;
- Meadow River from an area near the US 19 Bridge to its junction with the Gauley River;
- All streams within the Monongahela National Forest designated as National Wild and Scenic Study Rivers;
- All streams and other bodies of water in State and National Forests and Recreation Areas (included are streams and bodies of water located within the Spruce Knob, Seneca Rocks and Gauley River National Recreation Areas); and
- Streams and their tributaries as contained within the boundaries of the designated National Wilderness Areas or the headwaters of such rivers and their tributaries; Cranberry River, Red Creek, Laurel Fork and Otter Creek.

Regional General Condition 8

West Virginia Natural Stream Preservation Act: In accordance with the West Virginia Natural Stream Preservation Act, the following streams or rivers are protected from activities that would impound, divert or flood the body of water:

West Virginia Natural Stream Preservation Act

- Greenbrier River from its confluence with Knapps Creek to its confluence with the New River;
- Anthony Creek from its headwaters to its confluence with the Greenbrier River;
- Cranberry River from its headwaters to its confluence with the Gauley River;
- Birch River from Cora Brown Bridge in Nicholas County to its confluence with the Elk River; and
- New River from its confluence with the Greenbrier River to its confluence with the Gauley River.

Regional General Condition 9

Tier 3 Protected Waters: All PCNs involving work in Tier 3 Protected Waters (West Virginia Code of State Regulations, Requirements Governing Water Quality Standards, Title 47, Series 2) shall include prior written notification to the West Virginia Department of Environmental Protection, Division of Water and Waste Management. Tier 3 Protected Waters include, but are not limited to, all streams and rivers within the boundaries of Wilderness Areas designated by The Wilderness Act (16 U.S.C. §1131 et seq.) within the State, all Federally designated rivers under the “Wild and Scenic Rivers Act”, 16 U.S.C. §1271 et seq.; all streams and other bodies of water in state parks which are high quality waters or naturally reproducing trout streams; waters in national parks and forests which are high quality waters or naturally reproducing trout

streams; waters designated under the "National Parks and Recreation Act of 1978", as amended; and pursuant to subsection 7.1 of 60CSR5, those waters whose unique character, ecological or recreational value, or pristine nature constitutes a valuable national or state resource.

Regional General Condition 10

Archeological Sites and Human Remains: In the event any archeological sites or human remains are uncovered during construction, the permittee shall cease all work immediately and contact the appropriate Corps District office, the West Virginia Division of Culture and History at 304-558-0240 and the appropriate county Sheriff's Office.

F. West Virginia Department of Environmental Protection 401 Water Quality Certification Standard Conditions Applicable to ALL NWP's

The following are West Virginia's Section 401 Water Quality Certification standard and special conditions that apply to the Nationwide Permits 1-52 as published on February 21, 2012 in Part III of the *Federal Register* (77 FR 10184), by the U.S. Army Corps of Engineers. These conditions must be implemented into any activity authorized by a U.S. Army Corps of Engineers Nationwide Permit(s). The State's certification of these Nationwide Permit activities does not replace the need for the applicant proposing an activity under the Nationwide Permit Program from obtaining other applicable permits/authorizations from the West Virginia Department of Environmental Protection and/or the Division of Natural Resources. Each permittee shall, if they do not understand or are not aware of applicable Nationwide Permit conditions, contact the Corps of Engineers prior to conducting any activity authorized by a Nationwide Permit in order to be advised of applicable conditions. These 401 Water Quality Certifications, with all attendant standard conditions and special conditions, are applicable to Corps of Engineers Civil Works Projects in West Virginia.

1. The permittee will investigate for the presence of water supply intakes or other activities within 1/2 mile downstream, which may be affected by suspended solids and turbidity increases caused by work in the watercourse. The permittee will give notice to operators of any such water supply intakes and such other water quality dependent activities as necessary before beginning work in the watercourse in sufficient time to allow preparation for any change in water quality.
2. Excavation, dredging or filling in the watercourse will be done only to the extent necessary to achieve the project's purpose.
3. Spoil materials from the watercourse or onshore operations, including sludge deposits, will not be dumped in the watercourse, or deposited in wetlands or other areas where the deposit may adversely affect the surface or ground waters of the state.
4. The permittee will employ measures to prevent or control spills from fuels, lubricants or any other materials used in connection with construction and restrict them from entering the watercourse. Storage areas for chemicals, explosives, lubricants, equipment fuels,

etc., as well as equipment refueling areas, must include containment measures (e.g., liner systems, dikes, etc.) to ensure that spillage of any material will not contact surface or ground waters. Storage areas and refueling areas shall be a minimum distance of 100 feet from any surface water body. All spills shall be promptly reported to the State Center for Pollution, Toxic Chemical and Oil Spills, 1-800-642-3074.

5. Upon completion of in-stream operations all disturbances below the ordinary high water mark will be properly stabilized within 24 hours to prevent soil erosion. Where possible, stabilization shall incorporate revegetation using bioengineering as an alternative to rip rap. If rip rap is utilized, it is to be of such weight and size that bank stress or slump conditions will not be created due to its placement. Fill is to be clean, nonhazardous and of such composition that it will not adversely affect the biological, chemical or physical properties of the receiving waters. Unsuitable materials include but are not limited to : Cadmium chromium arsenate (CCA) and creosote treated lumber, car bodies, tires, large household appliances, construction debris, and asphalt. To reduce potential slope failure and/or erosion behind the material, fill containing concrete must be of such weight and size that promotes stability during expected high flows. Loose large slab placement of concrete sections from demolition projects greater than thirty-six inches in its longest dimension and tires are prohibited. Rebar or wire in concrete should not extend further than one (1) inch. All activities require the use of clean and coarse non erodible materials with 15% or less of like fines that is properly sized to withstand expected high flows.
6. Runoff from any storage areas or spills will not be allowed to enter storm sewers without acceptable removal of solids, oils and toxic compounds. Discharges from retention/detention ponds must comply with permit requirements of the National Pollutant Discharge Elimination System permit program of the West Virginia Department of Environmental Protection, Division of Water and Waste Management.
7. Land disturbances, which are integral to the completion of the permitted activity and are one (1) acre or greater in total area, must comply with the National Pollutant Discharge Elimination System or other state stormwater permit requirements as established by the West Virginia Department of Environmental Protection, Division of Water and Waste Management, if applicable. Best Management Practices for Sediment and Erosion Control, as described in the West Virginia Department of Environmental Protection's Erosion and Sediment Control Best Management Practice Manual, 2006, or similar documents prepared by the West Virginia Division of Highways may be used. These handbooks are available from the respective agency offices.
8. Concrete will not be permitted to enter the watercourse unless contained by tightly sealed forms or cells. Concrete handling equipment shall not discharge waste washwater into wetlands or watercourses at any time without adequate wastewater treatment as approved by the West Virginia Department of Environmental Protection, Division of Water and Waste Management.
9. In stream work in designated warm water streams and their adjacent tributaries during the fish spawning season, April - June and trout waters and their adjacent tributaries during

the trout water fish spawning season September 15-March 31st requires a spawning season waiver from the West Virginia Division of Natural Resources, Wildlife Resources Section. For information about specific stream designations contact DEP's Water Quality Standards Section at 304-926-0495. The Wildlife Resources Section, Trout Fisheries Program at 304-637-0245 or Warm Water fisheries Program 304-558-2771 should be contacted if a waiver is needed. In stream work may occur during the respective spawning season in ephemeral waters without a waiver if all reasonable measures are taken to minimize turbidity and sedimentation downstream associated with the proposed project.

10. Removal of well-established riparian vegetation not directly associated with the project construction is prohibited. Disturbance and removal of vegetation from project construction area is to be avoided, where possible, and minimized when necessary. Removal of vegetation shall not be allowed where stream bank stability under normal flow conditions would be compromised.
11. Operation of equipment instream is to be minimized and accomplished during low flow periods when practical. Ingress and egress for equipment shall be within the work site. Location of ingress and egress outside the immediate work area requires prior approval of the West Virginia Department of Environmental Protection, Division of Water and Waste Management in concurrence with the West Virginia Division of Natural Resources.
12. The permittee will comply with water quality standards as contained in the West Virginia Code of State Regulations, Requirements Governing Water Quality Standards, Title 47, Series 2.
13. Stream activities permitted under the Nationwide Permit Program require that a West Virginia Public Lands Corporation Right of Entry be obtained. Application for this authorization should be made to the West Virginia Division of Natural Resources, Office of Lands and Streams, Building 74, Room 200, 324 Fourth Avenue, South Charleston, West Virginia 25303, or by contacting them at 304-558-3225. Any activity within the 100-year floodplain requires approval from the appropriate Floodplain Manager. The following website provides a statewide listing of Floodplain Managers in West Virginia: www.dhsem.wv.gov/mitigation/floodplain/Pages/default.aspx
14. The deposit of dredged or fill materials in island back channels, embayments or stream mouths on Section 10 Rivers is not certified for any of the Nationwide Permits. Stream mouth is defined as the area extending 100 feet upstream and 100 feet downstream on receiving streams that are classified as a Section 10 stream.
15. This Standard Condition requires prior written authorization from the West Virginia Department of Environmental Protection, Division of Water and Waste Management for use of any of the Nationwide Permits for all work in Outstanding National Resource Waters listed within Section A below. Prior written notification to the West Virginia Department of Environmental Protection, Division of Water and Waste Management, is required for use of Nationwide Permits 3, 6, 7, 12, 13, 14, 16, 17, 18, 19, 27, 29, 33, 39, 40, 41, 42,

45, and 48 in any of the streams listed in Sections B and C as follows, except as may be provided for in the individual nationwide permit:

- A. Tier 3 Protection-- West Virginia Code of State Regulations, Requirements Governing Water Quality Standards, Title 47, Series 2. **Outstanding National Resource Waters:** Outstanding National Resource Waters include, but are not limited to, all streams and rivers within the boundaries of Wilderness Areas designated by The Wilderness Act (16 U.S.C. §1131 et seq.) within the State, all Federally designated rivers under the “Wild and Scenic Rivers Act”, 16 U.S.C. §1271 et seq.; all streams and other bodies of water in state parks which are high quality waters or naturally reproducing trout streams; waters in national parks and forests which are high quality waters or naturally reproducing trout streams; waters designated under the “National Parks and Recreation Act of 1978”, as amended; and pursuant to subsection 7.1 of 60CSR5, those waters whose unique character, ecological or recreational value, or pristine nature constitutes a valuable national or state resource. The listing of Tier 3 streams is located at:
http://www.dep.wv.gov/WWE/Programs/wqs/Documents/Tier%203%20Info/WV_Tier_3_Maps_20101006.pdf
 - B. All naturally reproducing trout streams in the following counties; Barbour, Fayette, Grant, Greenbrier, Hampshire, Hardy, Mercer, Mineral, Monroe, Nicholas, Pendleton, Pocahontas, Preston, Raleigh, Randolph, Summers, Tucker, Upshur and Webster. For information about specific streams contact Wildlife Resource Section, Trout Fisheries Program at 304-637-0245;
 - C. 'West Virginia Natural Stream Preservation Act' - The following streams or rivers are protected from activities that would impound, divert or flood the body of water: Greenbrier River from its confluence with Knapps Creek to its confluence with the New River, Anthony Creek from its headwaters to its confluence with the Greenbrier River, Cranberry River from its headwaters to its confluence with the Gauley River, Birch River from Cora Brown Bridge in Nicholas County to the confluence of the river with the Elk River, and New River from its confluence with the Greenbrier River to its confluence with the Gauley River.
16. Wetland and Stream Mitigation guidelines – The discharge of fill material into a stream or wetland is authorized based upon the following criteria:
1. One-tenth to ½ acre of wetland impact requires a Pre-Construction Notice (PCN) and plan for mitigation to be submitted to the Corps of Engineers along with the proposed plan for mitigation provided to the state for approval.
 2. The amount of fill in a wetland, wetland complex or wetland system without mitigation is not to cumulatively exceed 1/10 acre.

3. "West Virginia Stream Wetland Valuation Metric" (SWVM) will be used to assist with the determination of required mitigation. The metric is available at the Huntington and Pittsburgh Army Corps of Engineers web sites:

In all instances, mitigation for all impacts incurred through use of these Nationwide Permits must first be directed to elimination of the impacts, then minimization of the impacts and lastly through compensatory mitigation. In many cases, the environmentally preferable compensatory mitigation may be provided through approved mitigation banks or the West Virginia in-lieu fee program. Permittee responsible compensatory mitigation may be performed using the methods of: restoration, enhancement, establishment and in certain circumstances preservation. In general, the required compensatory mitigation should be located in the same watershed as the impact site, and located where it is most likely to successfully replace lost functions and services as the impacted site. However, the use of mitigation banks or in-lieu fee for in-kind replacement is not restricted to the major watershed in which the impact has occurred until such time as mitigation banks or in-lieu projects are developed in each major watershed.

When permittee responsible in-kind replacement mitigation is used it is to be accomplished at the following ratios until such time an approved functional assessment methodology is established for the state of West Virginia:

Impacts to open water wetlands are to be one (1) acre replaced for one (1) acre impacted.

Impacts to wet meadow/emergent wetlands are to be two (2) acres replaced for one (1) acre impacted.

Impacts to shrub-shrub and forested wetlands are to be three (3) acres replaced for one (1) acre impacted.

In instances where compensatory in-kind mitigation is completed 12 months prior to the impact of the resource, the replacement ratio may be reduced to as low as one (1) acre created/restored to every one (1) acre impacted.

NOTE: The ratio of created/restored wetlands to impacted wetlands not only insure no net loss, but assure the adequate replacement of the impacted wetlands functions and values at the level existing prior to the impact. For many of the more complicated type wetlands, such as scrub-scrub and forested, the values and functions cannot readily be replaced through creation. Furthermore, not all wetland creation is successful.

In certain instances, the West Virginia Department of Environmental Protection, Division of Water and Waste Management may consider the acquisition of existing wetlands. Acquisition ratios are the following:

5 to 1 for open water wetlands;
10 to 1 for wet meadow/emergent wetlands and
15 to 1 for scrub-scrub and forested wetlands

Under extenuating circumstances the director may accept lower ratios for high quality wetlands under significant threat of development.

All wetlands acquired, using the acquisition method of mitigation, will either be deeded to the West Virginia Division of Natural Resources' Public Land Corporation for management by the Wildlife Resources Section or placed under a conservation easement and be protected from disturbance by the permittee or their designee. Third party oversight of the conservation easement by a non-profit conservation organization is preferred.

Streams. Compensatory mitigation projects for stream impacts should attempt to replace lost functions. Mitigation will be determined on a case-by-case basis based on the pre and post condition stream quality and complexity of the mitigation project utilizing the SWVM worksheets. Compensatory mitigation may require protection through deed restrictions or conservation easements by the permittee or their designee.

17. Streams with Mussel populations.

A. Should native freshwater mussels be encountered during the use of any Nationwide Permit, all activity is to cease immediately and the Wildlife Resources Section, Wildlife Diversity Program is to be contacted (304-637-0245) to determine significance of the mussel population and the action to be taken.

B. The following list of streams are known to have mussel populations which are established as a protected "no take" species by the state or contain protected habitat of mussels on the Federal Endangered Species list. Applicants wishing to conduct projects in these streams are strongly encouraged to contact the Wildlife Resources Section, Wildlife Diversity Program with a detailed project description and an accurate project location. For further information please contact the Wildlife Resources Section, Wildlife Diversity program at 304-637-0245.

Applicants should also give consideration to utilizing WVDNR's Wildlife Data Base Inquiry process. This resource is designed for the applicant as an informative preplanning tool. It allows the applicant to know, in advance, if they will be encountering any federally listed endangered species (ES), state species of concern and high quality fish and wildlife habitats such as trout streams, warm water fisheries, wetlands, karst and cave habitats. This inquiry can be obtained from the: Wildlife Data Base Coordinator, PO Box 67, Elkins West Virginia 26241. Information on what to submit to receive an inquiry should be directed to data base coordinator at 304-637-0245.

HUNTINGTON DISTRICT

	James River Drainage
J-1	Potts Creek
J-1-E	South Fork Potts Creek
J-3	Cove Creek
	Big Sandy River Drainage
BS	Big Sandy River
BST	Tug Fork River
	Kanawha River Drainage
K	Kanawha River
K-1	Crooked Creek
K-12	Thirteenmile Creek
K-14	Sixteenmile Creek
K-21	Buffalo Creek
K-22	Hurricane Creek
K-22-F	Mill Creek (Tackett Branch ?)
K-24	Little Hurricane Creek
K-26	Guano Creek
KC	Coal River
KC-10	Little Coal River
KE	Elk River
KE-23	Big Sandy Creek
KE-23-N	Granny Creek
KE-23-Q-.5	Hollywood Trace Fork
KE-31	King Shoals Run
KE-37	Laurel Creek
KE-74	Strange Creek
KE-76	Birch River
KE-9	Little Sandy Creek
KN	New River
KN-51	Indian Creek
KNB	Bluestone River
KNG	Greenbrier River
KNG-18	Wolf Creek
KNG-22	Muddy Creek
KNG-22-B	Mill Creek
KNG-23	Second Creek
KNG-53	Knapp Creek
KNG-61	Clover Creek (Cloverlick Creek)
KNG-66	Sitlington Creek
KNG-68	Deer Creek
KNG-79	West Fork Greenbrier River
KP	Pocatalico River

KP-17	Pocatalico Creek (Left Fork)
KP-17-B	Middle Fork Pocatalico Creek
KP-33-E	Cox Fork
KP-39	Big Lick
KP-41	Rush Creek
KP-45	Cranes Nest Run
	Little Kanawha River Drainage
LK	Little Kanawha River
LK- 86	Sand Fork
LK-11	Slate Creek
LK-23	Tucker Creek
LK-25	Reedy Creek
LK-25-?	Left Fork Reedy Creek
LK-25-R	Middle Fork Reedy Creek
LK-31	Spring Creek
LK-31-AA	Right Fork Spring Creek
LK-31-Z	Left Fork Spring Creek
LK-39	Straight Creek
LK-40	Leading Creek
LK-45	Yellow Creek
LK-53	Pine Creek
LK-66	Tanner Creek
LK-72	Cedar Creek
LK-75	Leading Creek
LK-75-K	Cove Creek
LK-75-N	Fink Creek
LK-86	Sand Fork
LK-94	Oil Creek
LK-95	Saltlick Creek
LKH	Hughes River
LKH-10	North Fork Hughes River
LKH-10-C	Gillespie Run
LKH-10-G	Devilhole Creek
LKH-10-J	Addis Run
LKH-10-R	Bonds Creek
LKH-4	Goose Creek
LKH-9	South Fork Hughes River
LKH-9-AA	Middle Fork South Fork Hughes River
LKH-9-J	Indian Creek
LKH-9-M	Leatherbark Creek
LKH-9-R	Spruce Creek
LKH-9-W	Slab Creek
LKH-9-X	Bone Creek
LKH-9-Y	Otterslide Creek
LKS	Steer Creek

LKS-10	Left Fork Steer Creek
LKS-9	Right Fork Steer Creek
LKW	West Fork Little Kanawha River
LKW-15	Henry's Fork
LKW-15-F	Laurel Run
LKW-15-J	Beech Fork
LKW-31	Left Fork West Fork Little Kanawha River

Guyandotte River Drainage

OG	Guyandotte River
OG	Barboursville Lake
OG-14	Charley's Creek
OG-24	TwOMile Creek
OGM	Mud River
OGM-12-A	Kilgore Creek
OGM-20	Trace Fork
OGM-22	Buffalo Creek
OGM-25	Middle Fork Mud River
OGM-33	Big Laurel Creek

Middle Island Creek Drainage

OMI	Middle Island Creek
OMI-4	McKim Creek
OMI-9	Sugar Creek
OMI-21	Sancho Creek
OMI-23	Point Pleasant Creek
OMI-23-A	Pursley Creek
OMI-23-B	Elk Fork
OMI-29	Indian Creek
OMI-30	McElroy Creek
OMI-40	Arnold Creek
OMI-43	Bluestone Creek
OMI-46	Meathouse Fork
OMI-46-E	Toms Fork
OMI-46-J	Indian Fork
OMI-47	Buckeye Creek
OMI-46-E	Toms Fork
OMI-46-J	Indian Fork
OMI-47	Buckeye Creek

Ohio River Direct Drainage

O	Ohio River
O-2	Twelvepole Creek
O-2-H	Beech Fork
O-2-P	West Fork Twelvepole Creek
O-2-Q	East Fork Twelvepole Creek
O-9	Guyan Creek
O-30-A	Tombleson Run embayment

O-31	Little Mill Creek
O-32	Mill Creek
O-32-D	Cow run
O-32-H	Parchment Creek
O-32-L-7	Grasslick Creek
O-32-L-8	Bear Fork
O-32-M	Elk Fork
O-32-N	Little Mill Creek
O-36	Sandy Creek
O-36-D	Crooked Fork
O-36-J	Left Fork Sandy Creek
O-36-J-5	Nesselroad Run
O-38	Little Sandy Creek
O-43-D	Little Pond Creek
O-44	Lee Creek
O-44-A	South Fork Lee Creek
O-44-B	North Fork Lee Creek

PITTSBURGH DISTRICT

Ohio River Direct Drainage

	Ohio River
O-57	French Creek
O-69	Fishing Creek
O-69-N	South Fork Fishing Creek
O-69-O	North Fork Fishing Creek
O-77	Fish Creek
O-77-J	Valley Run
O-77-O	WV Fork Fish Creek
O-77-O-8	Long Drain Creek
O-88	Wheeling Creek
O-88-D-2	Middle Wheeling Creek
O-88-L	Turkey Run
O-88-O	Enlow Fork
O-88-O-?	Dunkard Fork
O-92	Buffalo Creek

Cheat River Drainage

M	Monongahela River
M-1	Dunkard Creek
M-1-?	Blacks Run
M-1-C	Days Run
M-1-E	Miracle Run
M-1-E-?	Right Branch Miracle Run
M-1-F	WV Fk Dunkard
M-1-F-6	North Fork WV Fork Dunkard Creek

M-1-F-6-A	Camp Run
M-1-F-7	South Fork WV Fork Dunkard Creek
MT	Tygart Valley River
MW	West Fork River
MW-13	Tenmile Creek upstream of Little Tenmile
MW-13-I-4	Jacob's Fork
MW-13-I-4	Salem Fork
MW-2	Booths Creek
MW-21	Elk Creek
MW-21-G	Brushy Fork of Elk Creek
MW-21-M	Gnatty Creek
MW-29	Isaacs Creek
MW-31	Hackers Creek
MW-31-C	Jesse Run
MW-32	Kincheloe Creek
MW-36	Freemans Creek
MW-36-D	Right Fork Freemans Creek
MW-38	Stonecoal Creek
MW-55	Right Fork West Fork River
MC-60-D	Blackwater River
MC-60-D-10	Sand Run
MC-60-D-8-	
A ?	Glade Run
MC-60-K-16	West Fork Gladys
P	Potomac River Drainage
P-4-M	Mill Creek
P-6	Back Creek
P-9	Sleepy Creek
PC	Cacapon River
PC-24	Lost River
PC-7	North River
PNB-4	Patterson Creek
PNB-4-EE	North Fork Patterson Creek (below dam near mouth)
PSB	South Branch Potomac River
PSB-21	South Fork South Branch

18. Isolated Wetlands.

In some cases, the Corps of Engineers may determine that an activity will not impact waters of the United States because the water is an isolated wetland, and therefore does not require a 404 permit. However, under West Virginia State code (§§22-11-3(23)) isolated wetlands are designated waters of the State. Accordingly, any applicant proposing to impact an isolated wetland must contact the West Virginia Department of Environmental Protection, Division of Water and Waste Management to obtain all necessary approvals for activities impacting any isolated wetlands.

APPENDIX A

Streams with potential presence of Federally listed threatened and endangered species or their habitat

HUNTINGTON DISTRICT:

1. Big Sandy Creek; Kanawha County: Snuffbox.
2. Bluestone River; Mercer and Summers counties (Bluestone Gorge to slackwater of Bluestone Reservoir): Virginia spiraea.
3. Cedar Creek; Braxton and Gilmer counties: Snuffbox.
4. Cove Creek; Monroe County: James spinymussel.
5. Elk River; Braxton, Clay, and Kanawha counties (Sutton Dam to slackwater below Coonskin Park), including the lower one-half mile reaches of its tributaries Birch River, Blue Creek, and Laurel Creek: Clubshell, Pink mucket pearl mussel, Northern riffleshell, Rayed bean, and Snuffbox. The Elk River also contains the Diamond darter (candidate).
6. Fishing Creek; Wetzel County: Snuffbox.
7. Gauley River; Fayette and Nicholas counties (Summersville Dam to Swiss): Virginia spiraea.
8. Greenbrier River; Greenbrier and Pocahontas counties: Virginia spiraea.
9. Henry Fork; Calhoun and Roane counties: Snuffbox.
10. Hughes River; Ritchie and Wirt counties, including the lower one-half mile reach of its tributary Goose Creek: Snuffbox.
11. Kanawha River; Fayette, Kanawha, Mason, and Putnam counties: Fanshell, Pink mucket pearl mussel, Sheepnose, Spectaclecase, and Tubercled-blossum pearl mussel.
12. Leading Creek; Gilmer and Lewis counties, including the lower one-half mile reach of its tributary Fink Creek: Snuffbox.
13. Little Kanawha River; Braxton, Calhoun, Gilmer, Wirt, and Wood counties, including the lower one-half mile reaches of its tributaries Leading Creek (Calhoun Co., different stream than 5.d. above), Pine Creek, Sand Fork, Slate Creek, Straight Creek, Tanner Creek, Tucker Creek, and Walker Creek: Snuffbox.

14. Marsh Fork River including Dingess Branch and Millers Camp Branch and associated palustrine emergent and scrub-shrub wetlands; Raleigh County: Virginia spiraea.
15. McElroy Creek; Doddridge and Tyler counties: Snuffbox.
16. Meadow River; Fayette, Greenbrier, and Nicholas counties: Virginia spiraea.
17. Meathouse Fork of Middle Island Creek; Doddridge County, including the lower one-half mile reaches of its tributary Toms Fork: Clubshell and Snuffbox.
18. Middle Island Creek; Doddridge, Pleasants, and Tyler counties, including the lower one-half mile reaches of its tributaries Arnold Creek, Bluestone Creek, Buckeye Creek, Indian Creek, McKim Creek, Point Pleasant Creek, and Sancho Creek: Clubshell, Rayed bean, and Snuffbox.
19. New River (Lower); Fayette County (Route 19 to Gauley Bridge): Virginia spiraea.
20. North Fork Hughes River; Ritchie and Wirt counties, including the lower one-half mile reaches of its tributaries Addis Run, Bonds Creek, Devilhole Creek, and Gillespie Run: Snuffbox.
21. Ohio River; Cabell, Jackson, Mason Pleasants, Tyler, Wetzel, and Wood counties: Fanshell, Pink mucket pearlymussel, Sheepnose, and Snuffbox.
22. Potts Creek and South Fork of Potts Creek; Monroe County: James spinymussel.
23. Reedy Creek; Roane and Wirt counties: Snuffbox.
24. South Fork Hughes River; Doddridge, Ritchie, and Wirt counties, including the lower one-half mile reaches of its tributaries Bone Creek, Indian Creek, Leatherbark Creek, Otterslide Creek, Slab Creek, and Spruce Creek: Clubshell and Snuffbox.
25. Spring Creek; Roane and Wirt counties: Snuffbox.
26. Steer Creek; Calhoun and Gilmer counties: Snuffbox.
27. Sugar Creek; Pleasants County: Snuffbox.
28. West Fork Little Kanawha River; Calhoun, Roane, and Wirt counties: Snuffbox.

PITTSBURGH DISTRICT

29. Back Creek; Berkeley County: Harperella.
30. Cacapon River; Morgan County: Harperella.

31. Dunkard Creek; Monongalia County: Snuffbox.
32. Fish Creek; Marshall County: Snuffbox.
33. Hackers Creek (of the West Fork River); Harrison and Lewis counties: Clubshell and Snuffbox.
34. Potomac River; Morgan County (from the mouth of the Cacapon River to the mouth of Sleepy Creek): Harperella.
35. Sleepy Creek; Morgan County: Harperella.
36. West Fork River; Harrison, Lewis, and Marion counties: Snuffbox.
37. Streams, springs, and wetlands connected to the groundwater system including caves, areas near sinkholes, and other groundwater/surface interfaces, from the Potomac River west to Opequon Creek, especially in the Rippon and Leetown Areas, and the Evitts Run Watershed; Jefferson and Berkeley counties: Madison Cave isopod.
38. Wetlands; Berkeley and Hardy counties: Northeastern bulrush.

Updated 7/13/12



GATEWAY

On Call. On Time. On Target.

#16-412

THE GATEWAY ENGINEERS, INC.

400 HOLIDAY DRIVE, SUITE 300
PITTSBURGH, PA 15220-2727
412.921.4030 PHONE
412.921.9960 FAX

www.gatewayengineers.com

LETTER OF TRANSMITTAL

January 15, 2016
C-18422-0010 and -0011

Doddridge County Commission
108 Court Street
Suite 1
West Union, WV 26456

Attn: George C. Eidel, OEM/Floodplain Manager

RE: EQM Gathering OPCO, LLC Pipelines
Floodplain Development Permit Application

2016 JAN 19 PM 1:00
DODDRIDGE COUNTY, WV
RECEIVED

Dear Mr. Eidel:

Enclosed you will find the following items we are sending via Fed Ex.

COPIES	DESCRIPTION
1	Floodplain Development Permit Application for D002 Pipeline
1	Check for each application fee
1	Floodplain Development Permit Application for D003/S036 Pipeline
1	Check for each application fee
1	Floodplain Development Permit Application for S033 Pipeline
1	Check for each application fee
1	CD containing all three applications

These are being provided for your use and records.

Sincerely,
THE GATEWAY ENGINEERS, INC.

Shanin D. Asbury
Shanin D. Asbury
Project Specialist

G:\Projects\18000\18422 EQT\2016-1-15 Transmittal to Doddrige Co.docx



GATEWAY

On Call. On Time. On Target.

THE GATEWAY ENGINEERS, INC.

400 HOLIDAY DRIVE, SUITE 300
PITTSBURGH, PA 15220-2727
412.921.4030 PHONE
412.921.9960 FAX

C-18422-0010
January 28, 2016

www.gatewayengineers.com

Doddridge County
108 Court Street
Suite 1
West Union, WV 26456

Attn: George Eidel

Re: MOSA D003/S036 Floodplain Permit

Dear George:

Please accept this letter as follow up to our conversation of January 26, 2016 regarding the above referenced floodplain application. After our permit submission, the Owner, EQM Gathering OpCo., LLC., had requested additional extra workspace adjacent to Caratelli Drive. This area can be seen within Appendix J – Impact 8 of the referenced application. In addition, a revised site plan has been provided herein showing the additional workspace that is being proposed. This area is proposed to be used for material storage, equipment parking, etc. during the course of construction. No ground alterations are being proposed to utilize this area. Upon completion of construction, all stored material will be removed and the area restored to its pre-construction condition and grades. As mentioned, no fill is proposed to be placed within this area; thereby, this activity is not planned to alter the flood elevation.

If you should have any questions, or require additional information, please call.

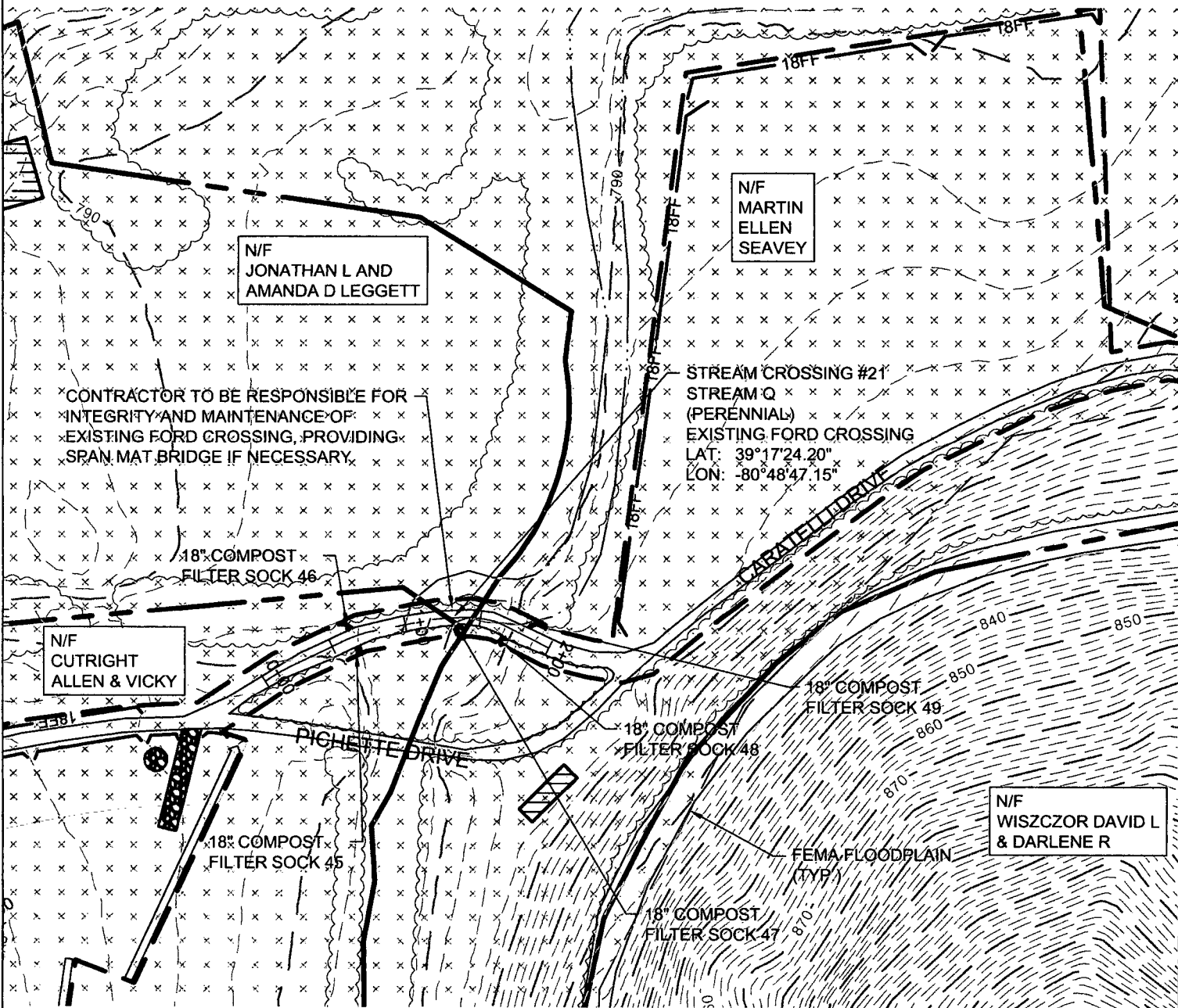
Sincerely,
THE GATEWAY ENGINEERS, INC.

Matthew E. Bagaley, P.E.
Project Manager

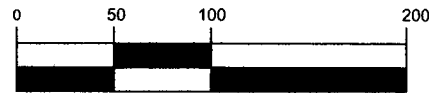
Enclosure

cc: Megan Stahl, EQM Gathering OpCo., LLC.
Matt Hoover, EQM Gathering OpCo., LLC.

g:\projects\18000\18422 cqt\0010 mosa d003 pipeline\docs\engineering\permitting\floodplain application\supplementalletter.docx



NOTE:
 THE PROPOSED PROJECT IS FOR THE
 INSTALLATION OF A NATURAL GAS
 PIPELINE. UPON INSTALLATION, THE
 FLOODPLAIN WILL BE RETURNED TO ITS
 PRE-CONSTRUCTION CONDITION.



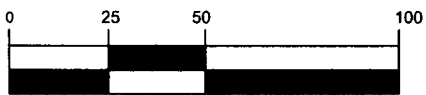
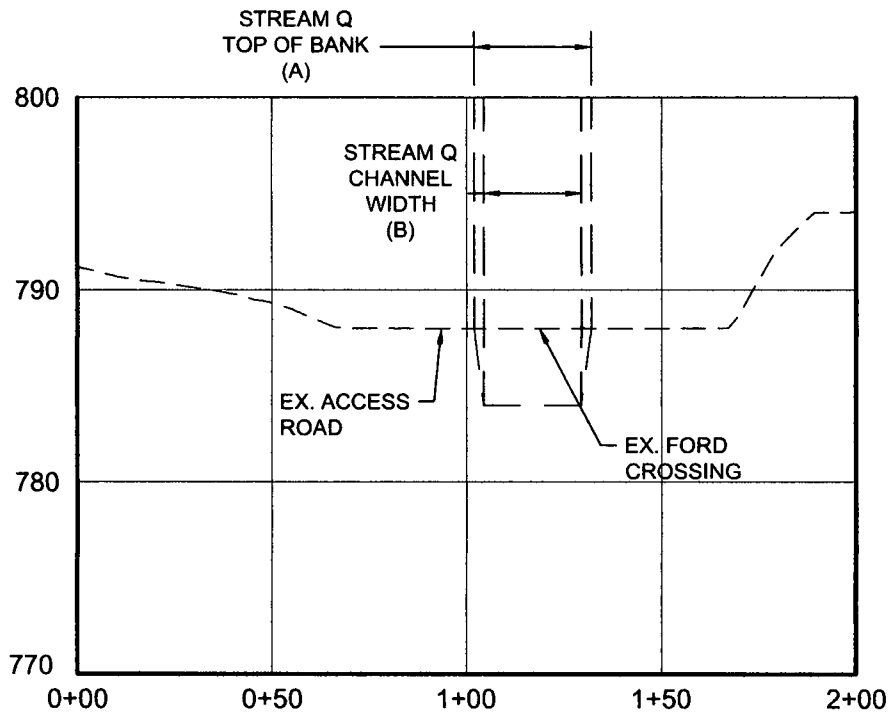
(IN FEET)
 1 inch = 100 ft.

STREAM CROSSING
 #21 PLAN
 Project Number: C-18422-0010
 Drawing Scale: 1"=100'
 Date Issued: DEC. 2015
 Index Number:
 Drawn By: JES
 Checked By: MEB
 Project Manager: MEB
APPENDIX J

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA
 PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
2016-01-20	01	REVISIONS PER DEP COMMENTS
2016-01-25	02	REVISIONS PER DEP COMMENTS
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY®
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING
#21 PROFILE
Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Index Number:
Drawn By: JES
Checked By: JES
Project Manager: MEB

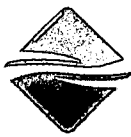
MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
825 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
2016-01-20	01	REVISIONS PER DEP COMMENTS
2016-01-25	02	REVISIONS PER DEP COMMENTS
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY®
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-0284

© Gateway Engineers Inc. All Rights Reserved



GATEWAY

On Call. On Time. On Target.

THE GATEWAY ENGINEERS, INC.

400 HOLIDAY DRIVE, SUITE 300
PITTSBURGH, PA 15220-2727
412.921.4030 PHONE
412.921.9960 FAX

C-18422-0010
January 28, 2016

www.gatewayengineers.com

Doddridge County
108 Court Street
Suite 1
West Union, WV 26456

Attn: George Eidel

Re: MOSA D003/S036 Floodplain Permit

Dear George:

Please accept this letter as follow up to our conversation of January 26, 2016 regarding the above referenced floodplain application. After our permit submission, the Owner, EQM Gathering OpCo., LLC., had requested additional extra workspace adjacent to Caratelli Drive. This area can be seen within Appendix J – Impact 8 of the referenced application. In addition, a revised site plan has been provided herein showing the additional workspace that is being proposed. This area is proposed to be used for material storage, equipment parking, etc. during the course of construction. No ground alterations are being proposed to utilize this area. Upon completion of construction, all stored material will be removed and the area restored to its pre-construction condition and grades. As mentioned, no fill is proposed to be placed within this area; thereby, this activity is not planned to alter the flood elevation.

If you should have any questions, or require additional information, please call.

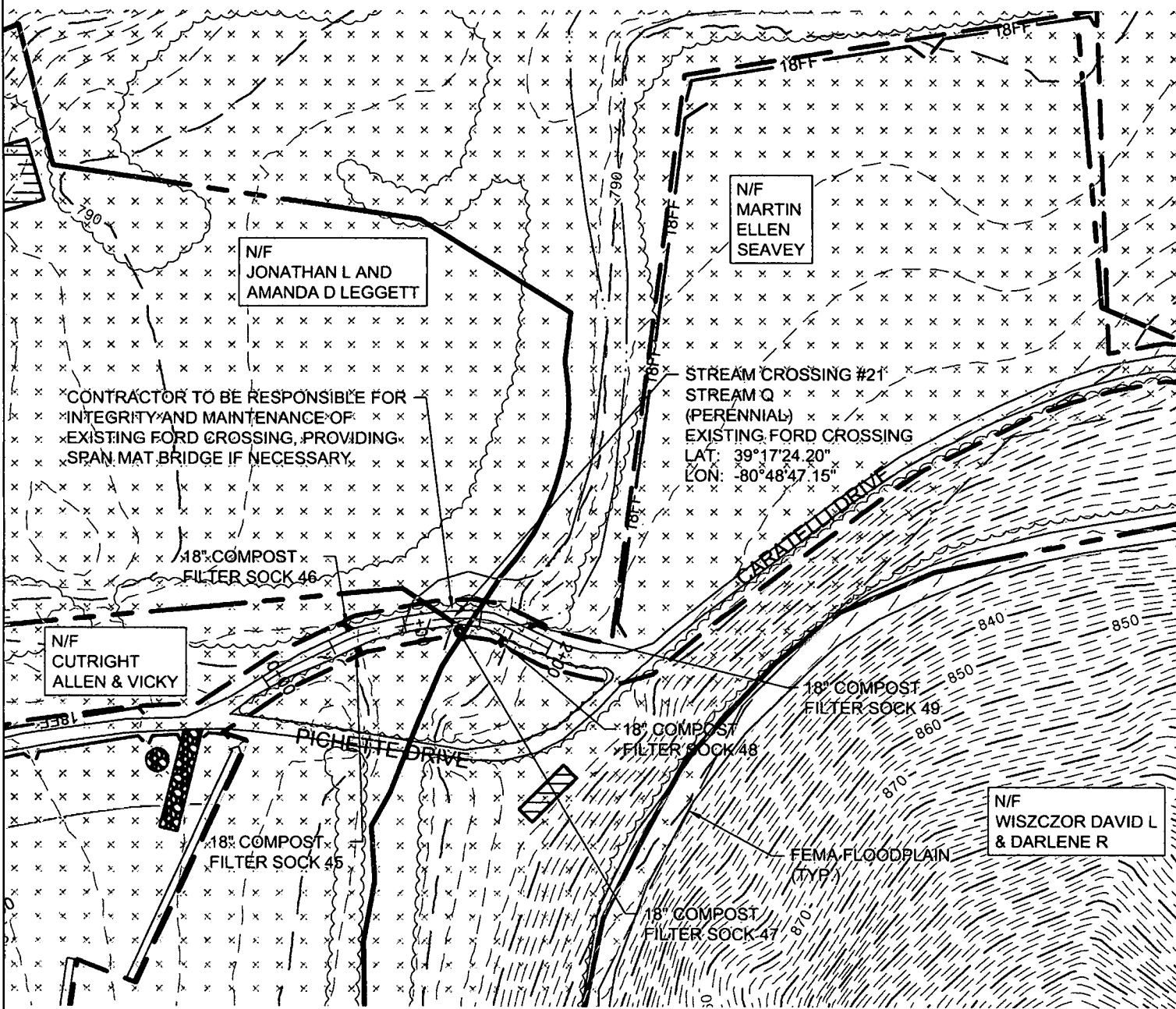
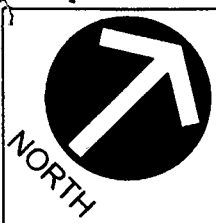
Sincerely,
THE GATEWAY ENGINEERS, INC.

Matthew E. Bagaley, P.E.
Project Manager

Enclosure

cc: Megan Stahl, EQM Gathering OpCo., LLC.
Matt Hoover, EQM Gathering OpCo., LLC.

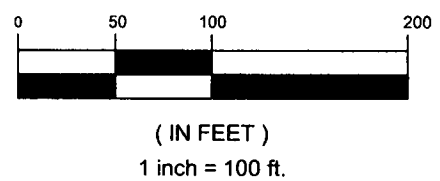
g:\projects\18000\18422 cqt\0010 mosa d003 pipeline\docs\engineering\permitting\floodplain application\supplementalletter.docx



CONTRACTOR TO BE RESPONSIBLE FOR INTEGRITY AND MAINTENANCE OF EXISTING FORD CROSSING, PROVIDING SPAN MAT BRIDGE IF NECESSARY.

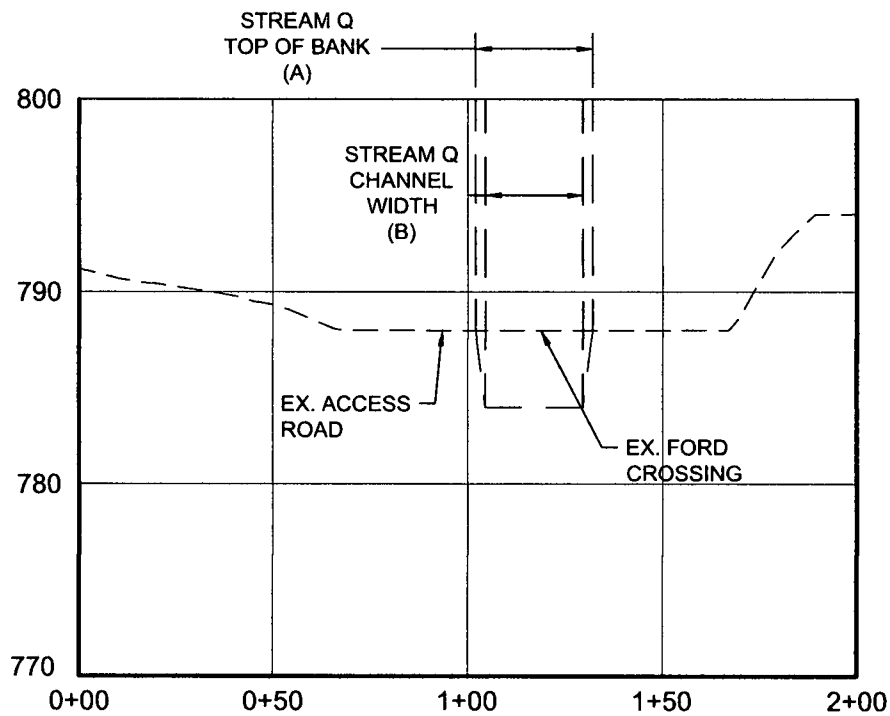
STREAM CROSSING #21
 STREAM Q (PERENNIAL)
 EXISTING FORD CROSSING
 LAT: 39°17'24.20"
 LON: -80°48'47.15"

NOTE:
 THE PROPOSED PROJECT IS FOR THE INSTALLATION OF A NATURAL GAS PIPELINE. UPON INSTALLATION, THE FLOODPLAIN WILL BE RETURNED TO ITS PRE-CONSTRUCTION CONDITION.



STREAM CROSSING #21 PLAN <small>Project Number: C-18422-0010 Drawing Scale: 1/2"=100' Date Issued: DEC. 2013 Index Number: Drawn By: JES Checked By: MEB Project Manager: MEB</small> APPENDIX J	MOSA D003 / MOSA S036 PIPELINE DODDRIDGE COUNTY, WEST VIRGINIA PREPARED FOR: EQM GATHERING OPCO, LLC 625 LIBERTY AVENUE PITTSBURGH, PENNSYLVANIA 15222	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th>Date</th> <th>No</th> <th>REVISION RECORD</th> </tr> </thead> <tbody> <tr> <td>2016-01-20</td> <td>01</td> <td>REVISIONS PER DEP COMMENTS</td> </tr> <tr> <td>2016-01-25</td> <td>02</td> <td>REVISIONS PER DEP COMMENTS</td> </tr> <tr> <td>-</td> <td>03</td> <td>-</td> </tr> <tr> <td>-</td> <td>04</td> <td>-</td> </tr> <tr> <td>-</td> <td>05</td> <td>-</td> </tr> <tr> <td>-</td> <td>06</td> <td>-</td> </tr> <tr> <td>-</td> <td>07</td> <td>-</td> </tr> <tr> <td>-</td> <td>08</td> <td>-</td> </tr> </tbody> </table>	Date	No	REVISION RECORD	2016-01-20	01	REVISIONS PER DEP COMMENTS	2016-01-25	02	REVISIONS PER DEP COMMENTS	-	03	-	-	04	-	-	05	-	-	06	-	-	07	-	-	08	-	GATEWAY® The Gateway Engineers, Inc. Full-Service Civil Engineering & Surveying Pittsburgh, PA <small>gatewayengineers.com 655-634-9284</small>
Date	No	REVISION RECORD																												
2016-01-20	01	REVISIONS PER DEP COMMENTS																												
2016-01-25	02	REVISIONS PER DEP COMMENTS																												
-	03	-																												
-	04	-																												
-	05	-																												
-	06	-																												
-	07	-																												
-	08	-																												

© Gateway Engineers Inc. All Rights Reserved



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING
#21 PROFILE

Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Index Number:
Drawn By: LIS
Checked By: MEB
Project Manager: MEB

APPENDIX J

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
2016-01-20	01	REVISIONS PER DEP COMMENTS
2016-01-25	02	REVISIONS PER DEP COMMENTS
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY®

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-6284



GATEWAY

On Call. On Time. On Target.

THE GATEWAY ENGINEERS, INC.

400 HOLIDAY DRIVE, SUITE 300
PITTSBURGH, PA 15220-2727
412.921.4030 PHONE
412.921.9960 FAX

C-18422-0010
January 28, 2016

www.gatewayengineers.com

Doddridge County
108 Court Street
Suite 1
West Union, WV 26456

Attn: George Eidel

Re: MOSA D003/S036 Floodplain Permit

Dear George:

Please accept this letter as follow up to our conversation of January 26, 2016 regarding the above referenced floodplain application. After our permit submission, the Owner, EQM Gathering OpCo., LLC., had requested additional extra workspace adjacent to Caratelli Drive. This area can be seen within Appendix J – Impact 8 of the referenced application. In addition, a revised site plan has been provided herein showing the additional workspace that is being proposed. This area is proposed to be used for material storage, equipment parking, etc. during the course of construction. No ground alterations are being proposed to utilize this area. Upon completion of construction, all stored material will be removed and the area restored to its pre-construction condition and grades. As mentioned, no fill is proposed to be placed within this area; thereby, this activity is not planned to alter the flood elevation.

If you should have any questions, or require additional information, please call.

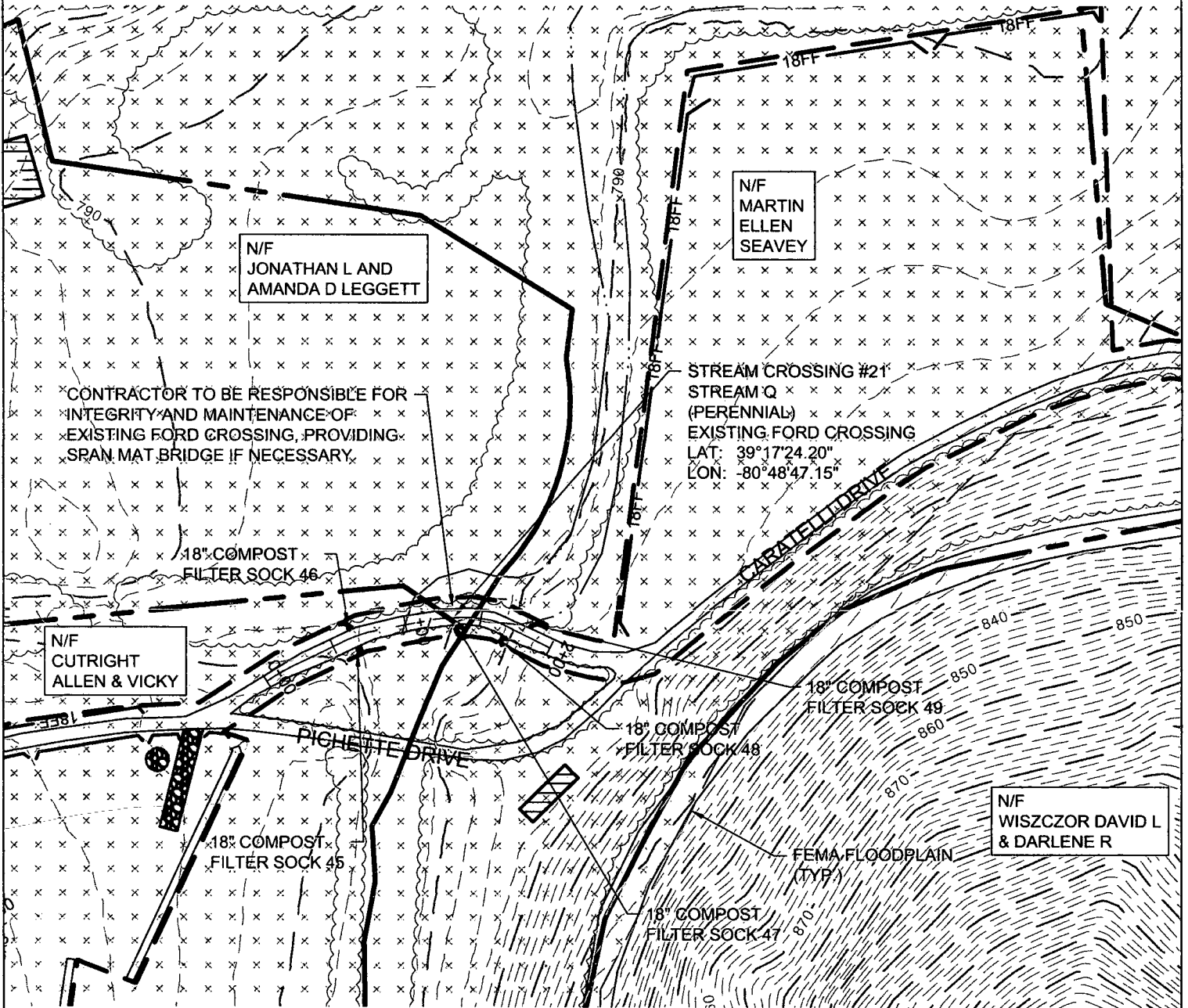
Sincerely,
THE GATEWAY ENGINEERS, INC.

Matthew E. Bagaley, P.E.
Project Manager

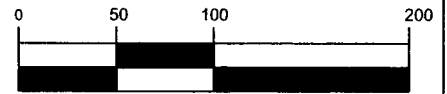
Enclosure

cc: Megan Stahl, EQM Gathering OpCo., LLC.
Matt Hoover, EQM Gathering OpCo., LLC.

g:\projects\18000\18422 eqt\0010 mosa d003 pipeline\docs\engineering\permitting\floodplain application\supplementalletter.docx

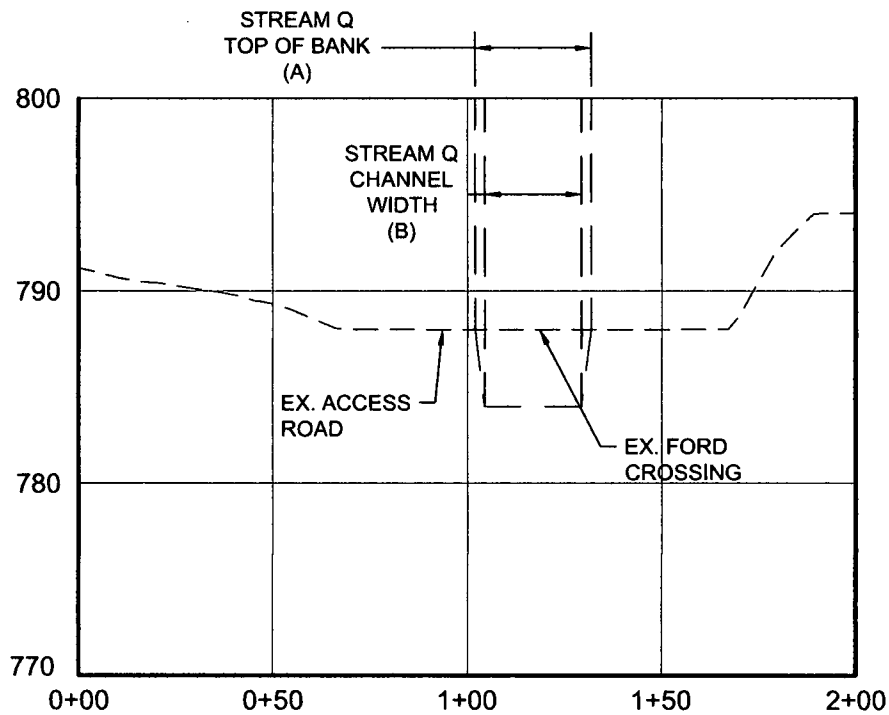


NOTE:
 THE PROPOSED PROJECT IS FOR THE INSTALLATION OF A NATURAL GAS PIPELINE. UPON INSTALLATION, THE FLOODPLAIN WILL BE RETURNED TO ITS PRE-CONSTRUCTION CONDITION.



(IN FEET)
 1 inch = 100 ft.

STREAM CROSSING #21 PLAN Project Number: C-18422-0010 Drawing Scale: 1"=100' Date Issued: DEC-2015 Index Number: Drawn By: JES Checked By: MEB Project Manager: MEB APPENDIX J	MOSA D003 / MOSA S036 PIPELINE DODDRIDGE COUNTY, WEST VIRGINIA		REVISION RECORD		GATEWAY® The Gateway Engineers, Inc. Full-Service Civil Engineering & Surveying Pittsburgh, PA gatewayengineers.com 855-634-9284																									
	PREPARED FOR: EQM GATHERING OPCO, LLC 625 LIBERTY AVENUE PITTSBURGH, PENNSYLVANIA 15222	<table border="1"> <tr> <th>Date</th> <th>No</th> <th>REVISIONS PER DEP COMMENTS</th> </tr> <tr> <td>2016-01-20</td> <td>01</td> <td>REVISIONS PER DEP COMMENTS</td> </tr> <tr> <td>2016-01-25</td> <td>02</td> <td>REVISIONS PER DEP COMMENTS</td> </tr> <tr> <td>-</td> <td>03</td> <td>-</td> </tr> <tr> <td>-</td> <td>04</td> <td>-</td> </tr> <tr> <td>-</td> <td>05</td> <td>-</td> </tr> <tr> <td>-</td> <td>06</td> <td>-</td> </tr> <tr> <td>-</td> <td>07</td> <td>-</td> </tr> <tr> <td>-</td> <td>08</td> <td>-</td> </tr> </table>	Date	No		REVISIONS PER DEP COMMENTS	2016-01-20	01	REVISIONS PER DEP COMMENTS	2016-01-25	02	REVISIONS PER DEP COMMENTS	-	03	-	-	04	-	-	05	-	-	06	-	-	07	-	-	08	-
Date	No	REVISIONS PER DEP COMMENTS																												
2016-01-20	01	REVISIONS PER DEP COMMENTS																												
2016-01-25	02	REVISIONS PER DEP COMMENTS																												
-	03	-																												
-	04	-																												
-	05	-																												
-	06	-																												
-	07	-																												
-	08	-																												



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING
#21 PROFILE

Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Index Number:
Drawn By: JES
Checked By: MEB
Project Manager: MEB

APPENDIX J

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
2016-01-20	01	REVISIONS PER DEP COMMENTS
2016-01-25	02	REVISIONS PER DEP COMMENTS
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY®

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-0284

© Gateway Engineers, Inc. All Rights Reserved



GATEWAY

On Call. On Time. On Target.

THE GATEWAY ENGINEERS, INC.

400 HOLIDAY DRIVE, SUITE 300
PITTSBURGH, PA 15220-2727
412.921.4030 PHONE
412.921.9960 FAX

C-18422-0010
C-18422-0011
C-18422-0012
January 28, 2016

FILED
2016 FEB - 2 AM 10: 02
BETH A. ROGERS
COUNTY CLERK
DODDRIDGE COUNTY, WV

Doddridge County
108 Court Street
Suite 1
West Union, WV 26456

Attn: George Eidel

Re: MOSA D002 Floodplain Permit
MOSA D003/S036 Floodplain Permit
MOSA S033 Floodplain Permit

Dear George:

Please accept this letter as follow up to our conversation of January 26, 2016 regarding the above referenced floodplain applications that have been submitted. It is the intent of the Owner, EQM Gathering OpCo., LLC., that the construction of the above reference pipeline projects will not have an impact on the floodplain or floodway at the proposed permitted crossings. They plan to restore all disturbed areas within the floodplain/floodway to pre-construction contours and conditions. No fill is proposed to be placed within these areas; thereby, their activity is not planned to alter the flood elevations.

If you should have any questions, or require additional information, please call.

Sincerely,
THE GATEWAY ENGINEERS, INC.

Matthew E. Bagaley, P.E.
Project Manager

cc: Megan Stahl, EQM Gathering OpCo., LLC.
Matt Hoover, EQM Gathering OpCo., LLC.

g:\projects\18000\18422 eqt\0010 mosa d003 pipeline\docs\engineering\permitting\floodplain application\supplementalletter.docx



GATEWAY

On Call. On Time. On Target.

THE GATEWAY ENGINEERS, INC.

400 HOLIDAY DRIVE, SUITE 300
PITTSBURGH, PA 15220-2727
412.921.4030 PHONE
412.921.9960 FAX

C-18422-0010
January 28, 2016

www.gatewayengineers.com

Doddridge County
108 Court Street
Suite 1
West Union, WV 26456

Attn: George Eidel

Re: MOSA D003/S036 Floodplain Permit

Dear George:

Please accept this letter as follow up to our conversation of January 26, 2016 regarding the above referenced floodplain application. After our permit submission, the Owner, EQM Gathering OpCo., LLC., had requested additional extra workspace adjacent to Caratelli Drive. This area can be seen within Appendix J – Impact 8 of the referenced application. In addition, a revised site plan has been provided herein showing the additional workspace that is being proposed. This area is proposed to be used for material storage, equipment parking, etc. during the course of construction. No ground alterations are being proposed to utilize this area. Upon completion of construction, all stored material will be removed and the area restored to its pre-construction condition and grades. As mentioned, no fill is proposed to be placed within this area; thereby, this activity is not planned to alter the flood elevation.

If you should have any questions, or require additional information, please call.

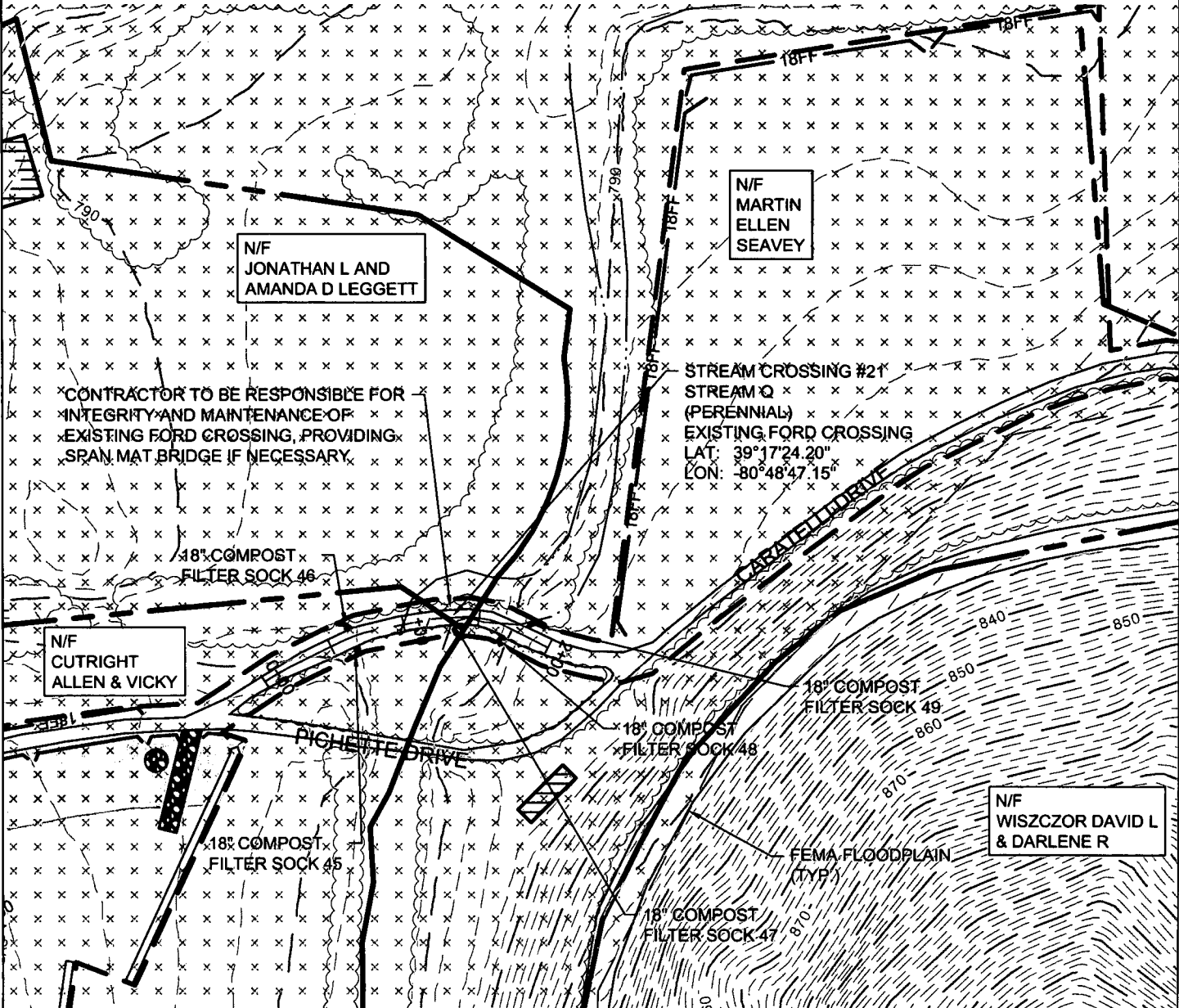
Sincerely,
THE GATEWAY ENGINEERS, INC.

Matthew E. Bagaley, P.E.
Project Manager

Enclosure

cc: Megan Stahl, EQM Gathering OpCo., LLC.
Matt Hoover, EQM Gathering OpCo., LLC.

g:\projects\18000\18422 eqt\0010 mosa d003 pipeline\docs\engineering\permitting\floodplain application\supplementalletter.docx



NOTE:
 THE PROPOSED PROJECT IS FOR THE INSTALLATION OF A NATURAL GAS PIPELINE. UPON INSTALLATION, THE FLOODPLAIN WILL BE RETURNED TO ITS PRE-CONSTRUCTION CONDITION.



(IN FEET)
 1 inch = 100 ft.

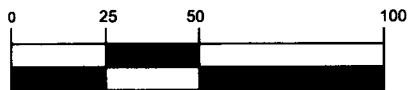
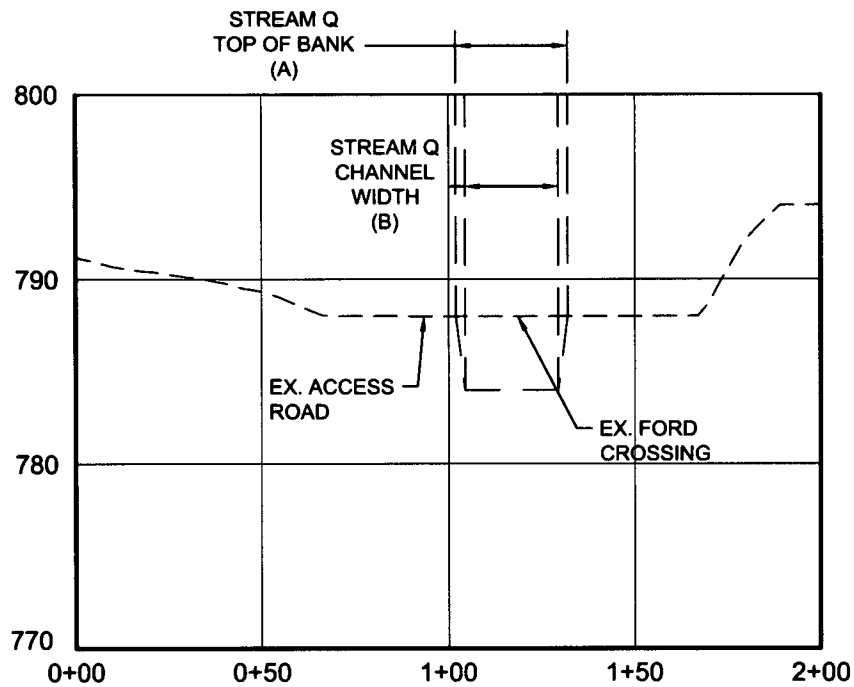
STREAM CROSSING #21 PLAN
 Project Number: C-18422-0010
 Drawing Scale: 1"=100'
 Date Issued: DEC, 2018
 Index Number:
 Drawn By: JLB
 Checked By: JLB
 Project Manager: JLB
APPENDIX J

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
2018-01-20	01	REVISIONS PER DEP COMMENTS
2018-01-25	02	REVISIONS PER DEP COMMENTS
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY®
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9294



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING
#21 PROFILE
Project Number: C-19422-0010
Drawing Scale: 1"=50'
Date Issued: 05-01-2018
Index Number:
Drawn By: JLB
Checked By: JEB
Project Manager: JEB

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA
PREPARED FOR:
EQM GATHERING OPCO, LLC
825 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
2018-01-20	01	REVISIONS PER DEP COMMENTS
2018-01-25	02	REVISIONS PER DEP COMMENTS
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY®
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-8284

© Gateway Engineers Inc. All Rights Reserved



George Eidel <doddridgecountyfpm@gmail.com>

RE: EQM Pipeline Projects

Matthew E. Bagaley, P.E. <mbagaley@gatewayengineers.com>

Fri, Mar 18, 2016 at 9:16 AM

To: George Eidel <doddridgecountyfpm@gmail.com>

George,

Please find attached the USACE permit for the MOSA D002 pipeline.

I believe that completes the other reviews. Is it possible for you to provide an email copy of the floodplain permit for this project if it can now be released?

Thanks,

Matt

From: Matthew E. Bagaley, P.E.
Sent: Friday, March 04, 2016 2:17 PM
To: George Eidel <doddridgecountyfpm@gmail.com>
Subject: RE: EQM Pipeline Projects

George,

Please find attached the DEP approval for the MOSA D002 pipeline.

Thanks,

Matt

From: Matthew E. Bagaley, P.E.

Sent: Thursday, February 18, 2016 3:59 PM
To: George Eidel <doddridgecountyfpm@gmail.com>
Subject: EQM Pipeline Projects

George,

Per our discussion, please find attached the following documents to supplement the permit packages that we had sent your way for EQM Gathering OpCo., LLC.

MOSA D003/S036

- Attached WV DEP approval letter.
- Attached DNR review letter and follow up email from Janet Clayton (DNR) clearing the mussel survey.

MOSA D002

- Attached DNR review letter and follow up email from Janet Clayton (DNR) clearing the mussel survey.

As I obtain additional information, I will forward along for your records.

Thanks,

Matt

2 attachments



Final Permit MOSA D002 Pipeline Project (LRH-2015-1041-OHR).pdf

1278K



NWP 12 handout.pdf

485K

Stahl, Megan D.

From: Casey Swecker <CSwecker@envsi.com>
Sent: Tuesday, February 16, 2016 3:00 PM
To: Michael Wellman
Subject: FW: EQM MOSAD002, MOSAD003, and MOSA S036 crossing of Arnold Creek

Please find the below WVDNR approval,

Thanks, Casey

From: Clayton, Janet L [<mailto:Janet.L.Clayton@wv.gov>]
Sent: Tuesday, February 16, 2016 11:42 AM
To: Kyle McGill <kmcgill@envsi.com>; Casey Swecker <CSwecker@envsi.com>; John Spaeth <jspaeth@envsi.com>
Subject: EQM MOSAD002, MOSAD003, and MOSA S036 crossing of Arnold Creek

With respect to the 4 pipeline crossings and access road crossings of Arnold Creek for the above projects, no further mussel issues need to be addressed if instream activities are initiated prior to June 15, 2016.

Janet L. Clayton
Wildlife Diversity Biologist
Mussel Program Leader
WV Division of Natural Resources
Wildlife Resources Section
PO Box 67
Elkins, WV 26241
voice 304-637-0245
fax 304-637-0250



George Eidel <doddridgecountyfpm@gmail.com>

RE: EQM Pipeline Projects

Matthew E. Bagaley, P.E. <mbagaley@gatewayengineers.com>

Fri, Mar 4, 2016 at 2:16 PM

To: George Eidel <doddridgecountyfpm@gmail.com>

George,

Please find attached the DEP approval for the MOSA D002 pipeline.

Thanks,

Matt

From: Matthew E. Bagaley, P.E.
Sent: Thursday, February 18, 2016 3:59 PM
To: George Eidel <doddridgecountyfpm@gmail.com>
Subject: EQM Pipeline Projects

George,

Per our discussion, please find attached the following documents to supplement the permit packages that we had sent your way for EQM Gathering OpCo., LLC.

MOSA D003/S036

- Attached WV DEP approval letter.
- Attached DNR review letter and follow up email from Janet Clayton (DNR) clearing the mussel survey.

MOSA D002

- Attached DNR review letter and follow up email from Janet Clayton (DNR) clearing the mussel survey.

As I obtain additional information, I will forward along for your records.

3/4/2016

Gmail - RE: EQM Pipeline Projects

Thanks,

Matt



WVR310636 Approval Letter.pdf

27K

The Doddridge Independent

The Doddridge Independent PUBLISHER'S CERTIFICATE

I, Michael D. Zorn, Publisher of The Doddridge Independent, A newspaper of general circulation published in the town of West Union, Doddridge County, West Virginia, do hereby certify that:

Permit Application # 16-412 Please take notice that on the 19th day of January, 2016 EQM Gathering OpCo, LLC filed an application for a Floodplain Permit to develop land located at or about: Location: Arnold Creek Area/ South Fork of Hughes River Received: 01/19/2016 Announced: 02/02/2016 Publication Date: Week of 01/19/2016 20-Day Comment Period Window (from Commission Meeting 2/22/2016) 90-Day Approval Window (from date of receipt) N/A Project Description: Pipeline

was published in The Doddridge Independent 2 times commencing on Friday, January 29, 2016 and Ending on Friday, February 5, 2016 at the request of:

George Eidel, Doddridge County Floodplain Manager & Doddridge County Commission

Given under my hand this Monday, February 8, 2016

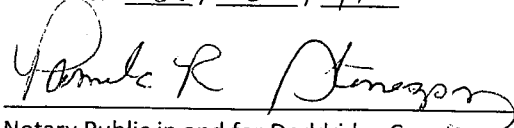
The publisher's fee for said publication is:

**\$ 25.27 1st Run / \$ 18.95 Subsequent Runs
This Legal Ad Total: \$ 44.22**


Michael D. Zorn
Publisher of The Doddridge Independent

Subscribed to and sworn to before me on

this date: 21 8 16


Notary Public in and for Doddridge County

My Commission expires on

The 17th day of May 20 16

Public Notice • Legal Notice

Doddridge County

Permit Application # 16-412

Please take notice that on the 19th day of January, 2016 EQM Gathering OpCo, LLC filed an application for a Floodplain Permit to develop land located at or about:

Location: Arnold Creek Area/ South Fork of Hughes River

Received: 01/19/2016

Announced: 02/02/2016

Publication Date: Week of 01/19/2016

20-Day Comment Period Window (from Commission Meeting 2/22/2016)

90-Day Approval Window (from date of receipt) N/A

Project Description: Pipeline

The Application is on file with the Clerk of the County Court and may be inspected or copied during regular business hours. As this project is outside the FEMA identified floodplain of Doddridge County, Doddridge County Floodplain Management has no regulatory authority. Any interested persons who desire to comment shall present the same in writing by February 22nd, 2016, delivered to:

Clerk of the County Court

118 E. Court Street, West Union, WV 26456

Beth A Rogers, Doddridge County Clerk

George Eidel, Doddridge County Flood Plain Manager

1/29 - 2/5



GATEWAY

On Call. On Time. On Target.

RPR26 16 2:46PM

C-18422-0011

January 2016
Revised April 2016

MOSA S033 Pipeline

Doddridge County, West Virginia

PREPARED FOR
EQM Gathering OpCo, LLC.
625 Liberty Avenue
Suite 1700
Pittsburgh, PA 15222

SUBMITTED BY
The Gateway Engineers, Inc.
400 Holiday Drive,
Suite 300
Pittsburgh, PA 15220
412.921.4030 PHONE
412.921.9960 FAX

www.gatewayengineers.com

REVIEWED BY
Matthew E. Bagaley, P.E.



A FULL-SERVICE CIVIL ENGINEERING FIRM

Doddridge County WV Floodplain Development Permit Application

TABLE OF CONTENTS

	<u>Page No.</u>
Floodplain Development Permit Application	Appendix A
USGS Site Location Map	Appendix B
Development Site/Property Information – Impact 2A	Appendix C
Development Site/Property Information – Impact 2B	Appendix D
Stream Impact Tables	Appendix E

APPENDIX A
FLOODPLAIN DEVELOPMENT PERMIT APPLICATION



Permit# LRH-2016-00024-LKR

Project Name: MOSA S033 Pipeline

Permittees Name: EQM Gathering
OpCo, LLC.

Doddridge County, WV

Floodplain Development Permit Application

This document is to be used for projects that impact/potentially impact the FEMA---designated floodplain and/or floodway of Doddridge County, WV pursuant to the rules and regulations established by all applicable Federal, State and local laws and ordinances, including the Doddridge County Floodplain Ordinance.

SECTION 1: GENERAL PROVISIONS (APPLICANT TO READ AND SIGN)

1. No work may start until a permit is issued.
2. The permit may be revoked if any false statements are made herein.
3. If revoked, all work must cease until permit is re-issued.
4. Development shall not be used or occupied until a Certificate of Compliance is issued.
5. The permit will expire if no work is commenced within six months of issuance.
6. Applicant is hereby informed that other permits may be required to fulfill local, state, and federal requirements.
7. Applicant hereby gives consent to the Floodplain Administrator/Manager or his/her representative to make inspections to verify compliance.
8. I THE APPLICANT CERTIFY THAT ALL STATEMENTS HEREIN AND IN ATTACHMENTS TO THIS APPLICATION ARE, TO THE BEST OF MY KNOWLEDGE, TRUE AND ACCURATE.

APPLICANT'S SIGNATURE _____

Megan Stahl

DATE _____

4/22/16

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Applicant Information:

Please provide all pertinent data.

Applicant Information		
Responsible Company Name: EQM Gathering OpCo, LLC		
Corporate Mailing Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
Corporate Point of Contact (POC): Megan Stahl		
Corporate POC Title: Permitting Supervisor		
Corporate POC Primary Phone: (412) 553-7783		
Corporate POC Primary Email: mstahl@eqt.com		
Corporate FEIN: 37-1661577	Corporate DUNS:	
Corporate Website: www.eqt.com		
Local Mailing Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 1522
Local Project Manager (PM): Matthew E. Bagaley, P.E.		
Local PM Primary Phone: (412) 921-4030		
Local PM Secondary Phone:		
Local PM Primary Email: mbagaley@gatewayengineers.com		
Person Filing Application: Megan Stahl		
Applicant Title: Permitting Supervisor		
Applicant Primary Phone: (412) 553-7783		
Applicant Secondary Phone:		
Applicant Primary Email: mstahl@eqt.com		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Project Narrative:

Describe in detail the proposed development including project name/title, type of development, estimated start and completion timeline, and its potential impact on the floodplain. Use additional copies of this page as needed.

Project Narrative:

The MOSA S033 Project received clearance from the Doddridge County Floodplain Management on March 21, 2016 under permit #16-412 (attached). The original approval covered 33 stream crossings (10 regulated – 23 unregulated) and two wetland crossings. The previously approved crossings are highlighted in blue on the attached USGS map. At this time, EQM Gathering OPCO, LLC has requested two (2) additional crossings of South Fork Hughes River, crossings #2A and #2B, as presented in the information attached. These additional two crossings are highlighted in red on the attached USGS map. Both of these pipeline crossings will be accomplished via the conventional bore method, producing no additional impacts.

The description for the entire project, with this revision is as follows: The project proponent, EQM Gathering OpCo, LLC. is proposing to construct approximately 6.5 miles of (1) 20-inch steel natural gas pipeline beginning at the MOSA S001B and MOSA S032 pipelines on South Fork Hughes River Road and ending at the Janus Compressor Station on the west side of Left Fork Run Road (C.R. 11/4) located in Doddridge County, West Virginia, southwest of West Union. The construction activity will also consist of the improvement of approximately 7.5 miles of existing gravel access road. The project will require thirty-five (35) stream crossings (33 previously approved) and two (2) wetland crossings (both previously approved) for access road and pipeline installation. Pipeline installation will be performed by open cut and conventional bore. The access roads will utilize existing culverts and ford crossings. All impacts will be temporary and the streams restored to their original condition after completion of the pipe installation. Consequently, mitigation is not proposed. The limits of disturbance will encompass approximately 92.3 acres. Location and site maps are attached. The project will begin April 2016 and end October 2016. Construction cost for these two additional crossings is estimated at \$100,000 equating to a permit fee of \$1,000.

EQM Gathering OPCO, LLC has requested two (2) additional crossings of South Fork Hughes River, crossings #2A and #2B, included in the information below. Both of these pipeline crossings will be accomplished via the conventional bore method, producing no additional impacts

New Impacts:

Impact #2A: (Referenced as Crossing #2A – Stream BB in Appendix B & C) – Crossing is proposed as a conventional bore and span mat of South Fork Hughes River, a perennial stream.

Impact #2B: (Referenced as Crossing #2B – Stream BB in Appendix B & D) – Crossing is proposed as a conventional bore and span mat of South Fork Hughes River, a perennial stream.

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Proposed Development:

Please check all elements of the proposed project that apply.

DESCRIPTION OF WORK (CHECK ALL APPLICABLE BOXES)

A. STRUCTURAL DEVELOPMENT

<u>ACTIVITY</u>	<u>STRUCTURAL TYPE</u>
<input type="checkbox"/> New Structure	<input type="checkbox"/> Residential (1 – 4 Family)
<input type="checkbox"/> Addition	<input type="checkbox"/> Residential (more than 4 Family)
<input type="checkbox"/> Alteration	<input type="checkbox"/> Non-residential (floodproofing)
<input type="checkbox"/> Relocation	<input type="checkbox"/> Combined Use (res. & com.)
<input type="checkbox"/> Demolition	<input type="checkbox"/> Replacement
<input type="checkbox"/> Manufactured/Mobil Home	

B. OTHER DEVELOPMENT ACTIVITIES:

- Fill Mining Drilling Pipelining
- Grading
- Excavation (except for STRUCTURAL DEVELOPMENT checked above)
- Watercourse Alteration (including dredging and channel modification)
- Drainage Improvements (including culvert work)
- Road, Street, or Bridge Construction
- Subdivision (including new expansion)
- Individual Water or Sewer System
- Other (please specify)

Construction cost for these crossings estimated at \$100,000 equating to a permit fee of \$1,000.

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Contractor Data:

Please provide all pertinent data for contractors and sub---contractors that may be participating in this project. Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: ____ of ____

Contractor/Sub-Contractor (C/SC) Information:		
C/SC Company Name:		
C/SC WV License Number:		
C/SC FEIN:	C/SC DUNS:	
Local C/SC Point of Contact (POC):		
Local C/SC POC Title:		
C/SC Mailing Address:		
City:	State:	Zip-Code:
Local C/SC Office Phone:		
Local C/SC POC Phone:		
Local C/SC POC E-Mail:		

Engineer Firm Information:		
Engineer Firm Name: The Gateway Engineers, Inc.		
Engineer WV License Number: 20101		
Engineer Firm FEIN: 25-1006946	Engineer Firm DUNS: 06-684-3053	
Engineer Firm Primary Point of Contact (POC): Matthew E. Bagaley, P.E.		
Engineer Firm Primary POC Title: Project Manager		
Engineer Firm Mailing Address: 400 Holiday Drive, Suite 300		
City: Pittsburgh	State: PA	Zip-Code: 15220-2727
Engineer Firm Office Phone: (412) 921-4030		
Engineer Firm Primary POC Phone: (412) 921-4030 ext. 153		
Engineer Firm Primary POC E-Mail: mbagaley@gatewayengineers.com		

Doddridge County Commercial/Industrial Floodplain Development Permit Application

Site Plan

A Site Plan is an accurate and detailed map of the proposed development for this project. It shows the size, shape, location and special features of the project property, and the size and location of any development planned to the property, especially as that development will impact the floodplain and/or floodway. Site plans show what currently exists on the project property, and any changes or improvements you are proposing to make. **A certified and licensed engineering firm should complete site plans.**

A SITE PLAN MUST CONTAIN THE FOLLOWING INFORMATION:

1. Legal description of the parcel, north arrow and scale
2. All property lines and their dimensions
3. Names of adjacent roads, location of driveways
4. Location of sloughs, tributaries, streams, rivers, wetlands, ponds, and lakes, with setbacks indicated, and including FEMA floodplain data based on most updated FIRM.
5. Location, size, shape of all buildings, existing and proposed, with elevation of lowest floor indicated.
6. Location and dimensions of existing or proposed on-site sewage systems.
7. Location of all propane tanks, fuel tanks or other liquid storage tanks whether above ground or below ground level.
8. Location and dimensions of any proposed pipeline placement(s) into floodplain/floodway.
9. Location and dimensions of any roadway development into floodplain/floodway. *(Includes initial development access roads)*
10. Location and dimensions of any bridge and/or culvert development into floodplain/floodway.
11. Location and dimensions of any storage yard or facility into the floodplain/floodway.
12. Location of any existing utilities and/or proposed utility placement and/or displacement.
13. Location, dimensions and depth of any existing or proposed fill on site.
14. A survey showing the **existing ground elevations** of at least location on the building site. **ELEVATION NOTE:** All vertical datum will reference either NGVD 29 or NAVD 88. Assumed datum will not be acceptable unless the property is located in an area where vertical datum has not been published. For those areas where vertical datum has not been established, a site plan with contours, elevations using assumed datum, high water marks and existing water levels of sloughs, rivers, lakes or streams and proposed lowest floor elevation.

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Applicant

Please read print name, sign and date below:

- I certify that I am authorized to submit this application for the primary project developer.
- I certify that the information included in this application is to the best of my knowledge true and complete.
- I certify that all required Federal, State, and local permits required by law and/or ordinance for the above described development of this project have been properly attained, are current and valid, and must be presented with this application before a Doddridge County Floodplain Permit may be issued.
- I understand that if in the course of the development project additional permits become required that were not needed during the initial proposal, the primary developer must notify the Doddridge County Floodplain Manager within 48 hours of such need, and that a "Stop Work" order may be issued for all project work directly impacting the floodplain or floodway, until such time the required additional permits are acquired.
- I understand that once the floodplain permit is submitted, the application will be entered into official public record at the next regularly scheduled Doddridge County Commission meeting after the date of submittal.
- I understand that from the date of submittal of the fully completed permit application, the Doddridge County Floodplain Manager has ninety (90) days to make a determination to either grant or deny said permit application. During this approval period, the Doddridge County Floodplain Manager may, at his or her discretion, conduct a review and/or additional study of provided documentation by means of an independent engineering firm. All costs associated with said review and/or study must be reimbursed to the County before issuance of approved permit.
- I understand that during the approval period, the Doddridge County Floodplain Manager or designee may at his or her discretion conduct site visits and document conditions of proposed development pursuant to the permit application.
- I understand that once the Floodplain Permit is granted, the permit will be entered into official public record at the next scheduled Doddridge County Commission meeting after the date of issuance. Appeals to the permit may be made no later than twenty (20) days after said issuance. If a valid appeal is submitted, as determined by the Doddridge County Floodplain Manager, a "Stop Work" order will be issued for all project development directly involving the floodplain or floodway. A public hearing by the Doddridge County Appeals Board will be scheduled no less than ten (10) days after the next regularly scheduled Doddridge County Commission meeting.
- I understand that all decisions of the Doddridge County Appeals Board shall be final.
- **I understand issuance of a Floodplain Permit authorizes me to proceed with construction as proposed. A Certificate of Compliance is required upon substantial completion of the project.**
- In signing this application, the primary developer hereby grants the Doddridge County Floodplain Manager or designee the right to enter onto the above---described location to inspect the development work proposed, in progress, and/or completed.
- I understand that if I do not follow exactly the site---plan submitted and approved by this permit that a "Stop Work" order may be issued by the Wirt County Floodplain Manager and that I must stop all construction immediately until discrepancies of actual work vs. proposed work is resolved.

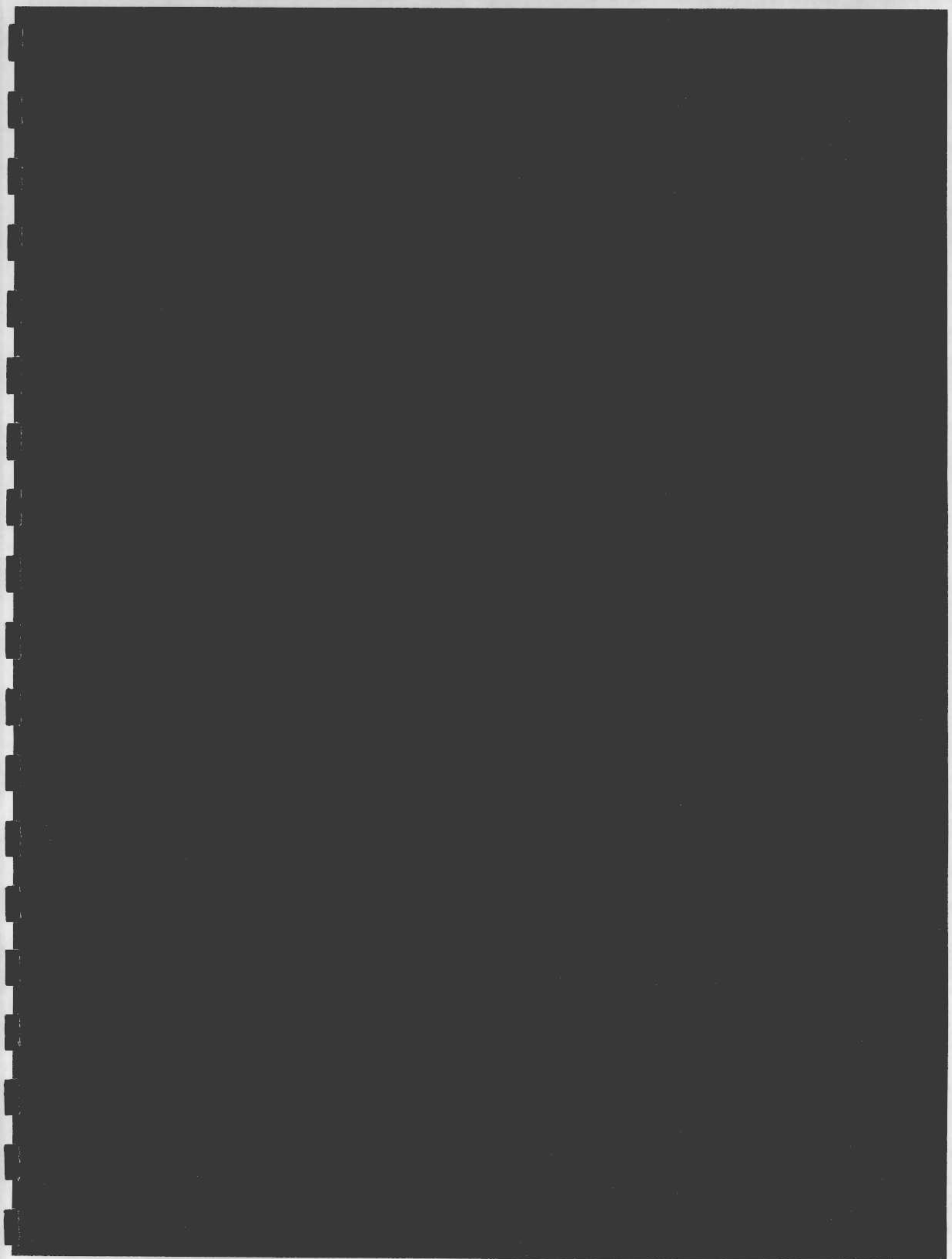
Applicant Signature: _____

Megan Stahl

Date: 4/22/16

Applicant Printed Name: _____

MEGAN STAHL

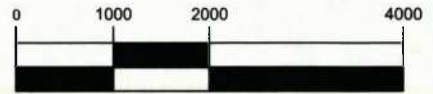


APPENDIX B
USGS SITE LOCATION MAP

FOR CONTINUATION, SEE SHEET USGS-B



NORTH



(IN FEET)

1 inch = 2000 ft.

STREAM CROSSING #21
 STREAM MM (EPHEMERAL)
 (UNREGULATED FLOODPLAIN)
 CROSSING: EXISTING FORD
 LAT: 39°12'33.89"N
 LON: 80°47'24.81"W

STREAM CROSSING #20
 STREAM NN (INTERMITTENT)
 (UNREGULATED FLOODPLAIN)
 CROSSING: EXISTING CULVERT
 LAT: 39°12'31.53"N
 LON: 80°47'26.94"W

STREAM CROSSING #11
 STREAM GG (INTERMITTENT)
 (UNREGULATED FLOODPLAIN)
 CROSSING: OPEN CUT/SPAN
 MAT BRIDGE
 LAT: 39°11'57.45"N
 LON: 80°48'22.20"W

STREAM CROSSING #9
 STREAM BB (PERENNIAL)
 (REGULATED FLOODPLAIN)
 CROSSING: CONVENTIONAL
 BORE/SPAN MAT BRIDGE
 LAT: 39°11'41.07"N
 LON: 80°48'16.62"W

STREAM CROSSING #10
 STREAM BB (PERENNIAL)
 (REGULATED FLOODPLAIN)
 CROSSING: CONVENTIONAL
 BORE/SPAN MAT BRIDGE
 LAT: 39°11'42.76"N
 LON: 80°48'20.50"W

STREAM CROSSING #8
 STREAM BB (PERENNIAL)
 (REGULATED FLOODPLAIN)
 CROSSING: CONVENTIONAL
 BORE/SPAN MAT BRIDGE
 LAT: 39°11'40.18"N
 LON: 80°48'14.93"W

STREAM CROSSING #7
 STREAM BB (PERENNIAL)
 (REGULATED FLOODPLAIN)
 CROSSING: CONVENTIONAL
 BORE/SPAN MAT BRIDGE
 LAT: 39°11'36.15"N
 LON: 80°48'07.66"W

STREAM CROSSING #4
 STREAM BB (PERENNIAL)
 (REGULATED FLOODPLAIN)
 CROSSING: CONVENTIONAL
 BORE/SPAN MAT BRIDGE
 LAT: 39°11'27.04"N
 LON: 80°47'55.59"W

STREAM CROSSING #3
 STREAM CC (INTERMITTENT)
 (REGULATED FLOODPLAIN)
 CROSSING: OPEN CUT/SPAN MAT BRIDGE
 LAT: 39°11'24.28"N
 LON: 80°47'50.75"W

STREAM CROSSING #2B
 (REGULATED FLOODPLAIN)
 STREAM BB (PERENNIAL)
 CROSSING: CONVENTIONAL BORE/SPAN MAT BRIDGE
 LAT: 39°11'24.42"N
 LON: 80°47'48.96"W

STREAM CROSSING #6
 STREAM EE (INTERMITTENT)
 (REGULATED FLOODPLAIN)
 CROSSING: OPEN CUT/SPAN MAT BRIDGE
 LAT: 39°11'33.81"N
 LON: 80°48'01.58"W

STREAM CROSSING #5
 STREAM DD (EPHEMERAL)
 (REGULATED FLOODPLAIN)
 CROSSING: OPEN CUT/SPAN MAT BRIDGE
 LAT: 39°11'31.60"N
 LON: 80°47'58.68"W

STREAM CROSSING #1
 (REGULATED FLOODPLAIN)
 STREAM AA (INTERMITTENT)
 CROSSING: OPEN CUT/SPAN MAT BRIDGE
 LAT: 39°11'24.81"N
 LON: 80°47'41.79"W

WETLAND CROSSING #1
 WETLAND AA (PEM/PSS) - CROSSING PEM
 PORTION
 CROSSING: OPEN CUT/SPAN MAT BRIDGE
 LAT: 39°11'24.81"N
 LON: 80°47'41.79"W

TIE INTO MOSAS001B &
 MOSAS032 PIPELINES

LAT: 39°11'24.31"
 LON: -80°47'38.95"

SOUTH FORK
 HUGHES RIVER

STREAM CROSSING #2
 (REGULATED FLOODPLAIN)
 STREAM BB (PERENNIAL)
 CROSSING: CONVENTIONAL BORE/SPAN MAT BRIDGE
 LAT: 39°11'24.68"N
 LON: 80°47'43.39"W

STREAM CROSSING #2A
 (REGULATED FLOODPLAIN)
 STREAM BB (PERENNIAL)
 CROSSING: CONVENTIONAL BORE/SPAN MAT BRIDGE
 LAT: 39°11'24.25"N
 LON: 80°47'47.20"W

USGS SITE LOCATION MAP

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
2016-04-20	01	ADDITION OF CROSSINGS 2A&B
	02	
	03	
	04	
	05	
	06	
	07	
	08	

Project Number: C-18422-0011
 Drawing Scale: 1" = 2000'
 Date Issued: DEC 2015
 Index Number:
 Drawn By:
 Checked By:
 Project Manager: DJH

USGS-A

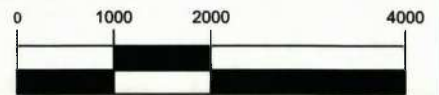


The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA

gatewayengineers.com 855-634-9284

JANUS COMPRESSOR STATION

LAT: 39°15'26.80"
LON: -80°48'22.97"



(IN FEET)
1 inch = 2000 ft.

STREAM CROSSING #19
STREAM A (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE
LAT: 39°15'13.11N
LON: 80°48'14.39"W

STREAM CROSSING #32
STREAM K (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING FORD
LAT: 39°15'09.83"N
LON: 80°48'18.86"W

WETLAND CROSSING #3
WETLAND 1 (PEM)
SPAN MAT BRIDGE
LAT: 39°14'44.75"N
LON: 80°48'15.31"W

STREAM CROSSING #18
STREAM C (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN
MAT BRIDGE
LAT: 39°14'52.63N
LON: 80°48'16.01"W

PROPOSED 20"
MOSA S033 PIPELINE

LEFT FORK ARNOLD CREEK

RIGHT FORK ARNOLD CREEK

STREAM CROSSING #17
STREAM 4 (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE
LAT: 39°14'22.70N
LON: 80°47'47.64"W

STREAM CROSSING #28
STREAM 18 (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING CULVERT
LAT: 39°14'20.74"N
LON: 80°47'35.69"W

STREAM CROSSING #29
STREAM 7 (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING CULVERT / SPAN MAT BRIDGE
LAT: 39°14'19.21"N
LON: 80°47'44.35"W

STREAM CROSSING #16
STREAM 10 (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE
LAT: 39°14'02.87N
LON: 80°47'44.77"W

STREAM CROSSING #14
STREAM S (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE
LAT: 39°13'53.76N
LON: 80°47'59.96"W

STREAM CROSSING #15
STREAM Q (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE
LAT: 39°13'53.90N
LON: 80°47'59.97"W

STREAM CROSSING #25
STREAM N (INTERMITTENT/PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING FORD
LAT: 39°13'29.38"N
LON: 80°47'58.36"W

STREAM CROSSING #27
STREAM N (INTERMITTENT/PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING FORD
LAT: 39°13'30.97"N
LON: 80°48'12.14"W

STREAM CROSSING #13
STREAM N (INTERMITTENT/PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT
BRIDGE
LAT: 39°13'30.32N
LON: 80°47'49.08"W

STREAM CROSSING #26
STREAM N (INTERMITTENT/PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING FORD
LAT: 39°13'29.27"N
LON: 80°48'06.99"W

STREAM CROSSING #23
STREAM T (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING CULVERT
LAT: 39°13'19.45"N
LON: 80°47'43.00"W

STREAM CROSSING #24
STREAM T (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING FORD
LAT: 39°13'26.87"N
LON: 80°47'46.61"W

STREAM CROSSING #12
STREAM LL (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE
LAT: 39°13'11.80"N
LON: 80°47'46.33"W

FOR CONTINUATION, SEE SHEET USGS-A

USGS SITE LOCATION MAP

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

Project Number: C-18422-0011
Drawing Scale: 1" = 2000'
Date Issued: DEC 2015
Index Number:
Drawn By:
Checked By:
Project Manager: DMH

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222



GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

APPENDIX C

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 2A

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 2A of 10

Site/Property Information:		
Legal Description: Large Forested Commercial Lot (Stream Crossing #2A)		
Physical Address/911 Address: Parcel Tax ID: 7-10-2		
Decimal Latitude/Longitude: 39.190077 N / 80.796454 W		
DMS Latitude/Longitude: 39° 11' 24.25" N / 80° 47' 47.20" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Commercial Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 2A of 10

Property Owner Data:		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

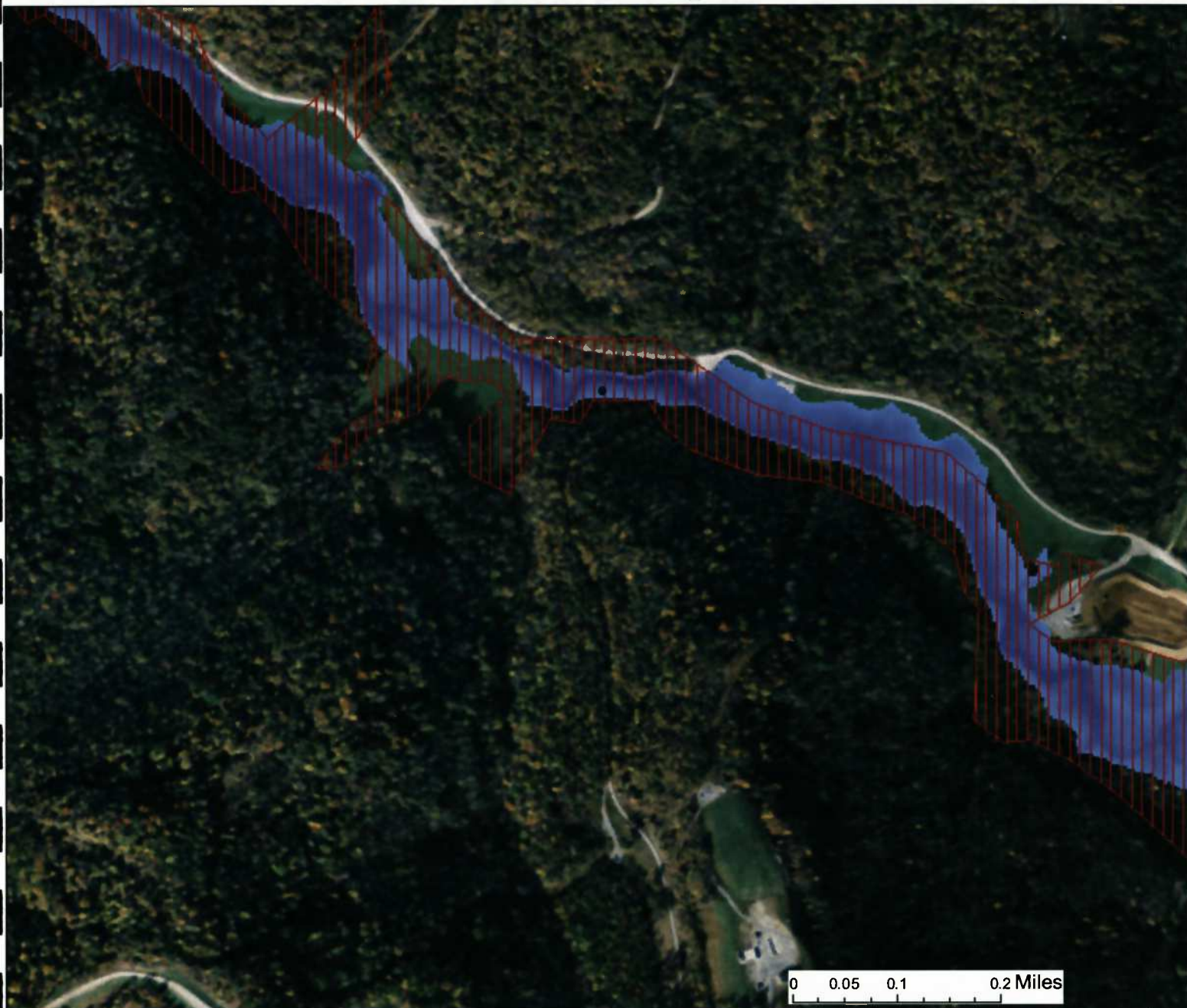
Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Robert Brannon ETAL		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		


Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Lucy E Harper		
Physical Address: 511 Boca Ciega Point Blvd N		
City: St. Petersburg	State: FL	Zip: 33708
PO Primary Phone: 727-398-6311		
PO Secondary Phone:		
PO Primary Email:		




WV Flood Map Impact 2A






This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

Map created on April 20, 2016

 Location of flood information
User Notes:

-  Cross Section (XS) Lines
-  Base Flood Elevation (BFE) Lines
-  Floodway

Flood Hazard Zone

-  Approximate Study (Zone A)
-  Detailed Study (AE, AH, AO)
-  Community Rating System Areas

Disclaimer:

The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov.
 WV Flood Tool (<http://www.MapWV.gov/flood>) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.

Flood Hazard Area:

Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.

Flood Hazard Zone: A (Advisory A) (Advisory /
Stream: South Fork Hughes River

FEMA Issued Flood Map: 54017C0225C

Watershed (HUC8): Little Kanawha (5030203)

Advisory Flood Height: About 874 ft

Water Depth: About 2.0 ft (Source: HEC_RA

Elevation: About 872 ft

Location (long, lat): (80.796454 W, 39.190077 N)

Location (UTM 17N): (517578, 4337889)

Contacts: Doddridge











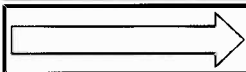





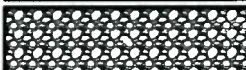




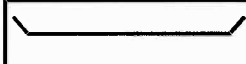
CRS Information: N/A

Flood Profile:

HEC-RAS Model: South Fork Hughes River

Parcel Number:

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

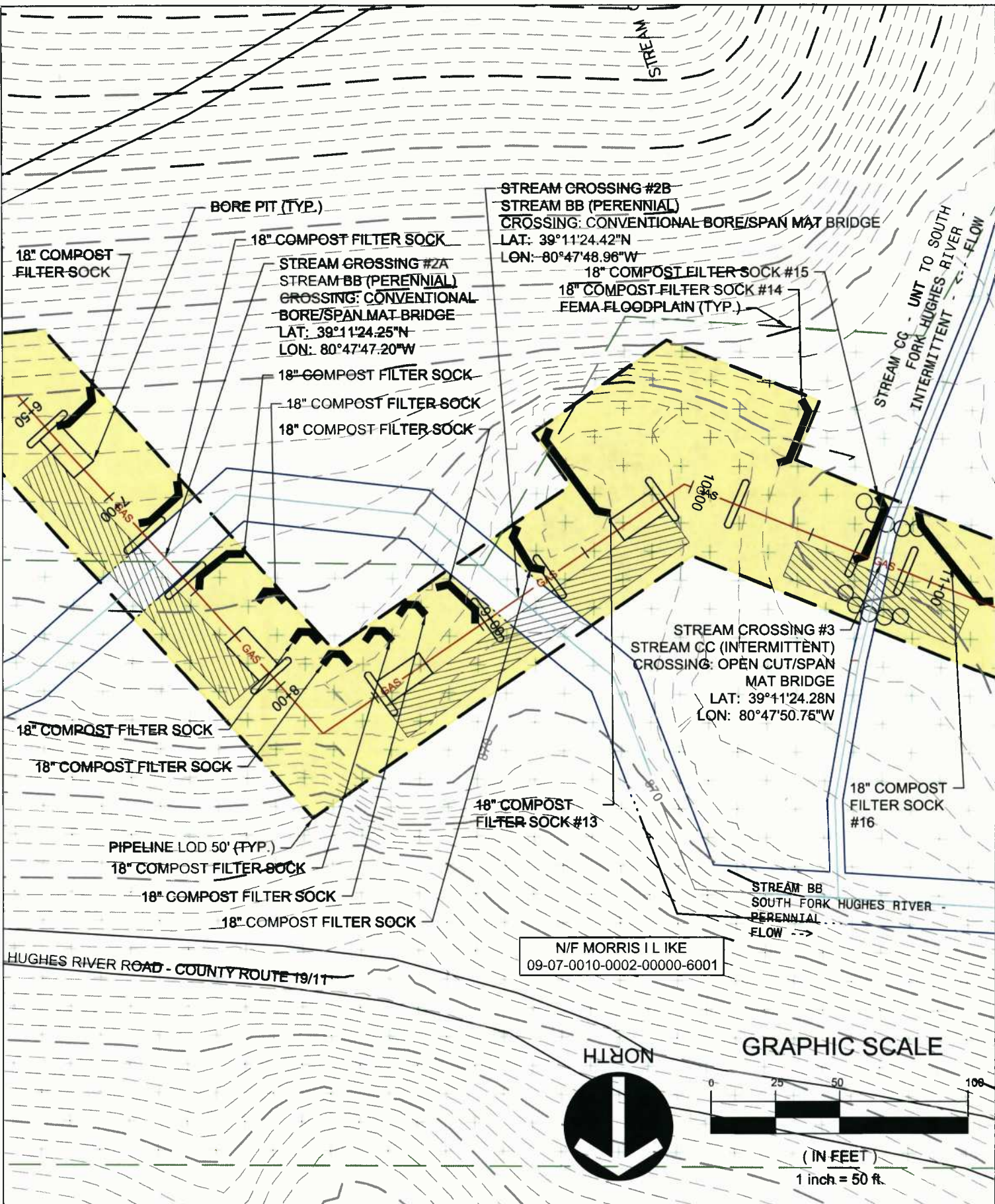
Project Number: 18422-0011
 Drawing Scale: N.T.S.
 Date Issued: JAN 2018
 Issue Number:
 Drawn By: JCS
 Checked By: JCS
 Project Manager: JCS

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

LEGEND



GATEWAY®
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-8284



STREAM CROSSING #2A
PLAN

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2016
Index Number:
Drawn By: JTB
Checked By: DMH
Project Manager: DMH

APPENDIX M

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

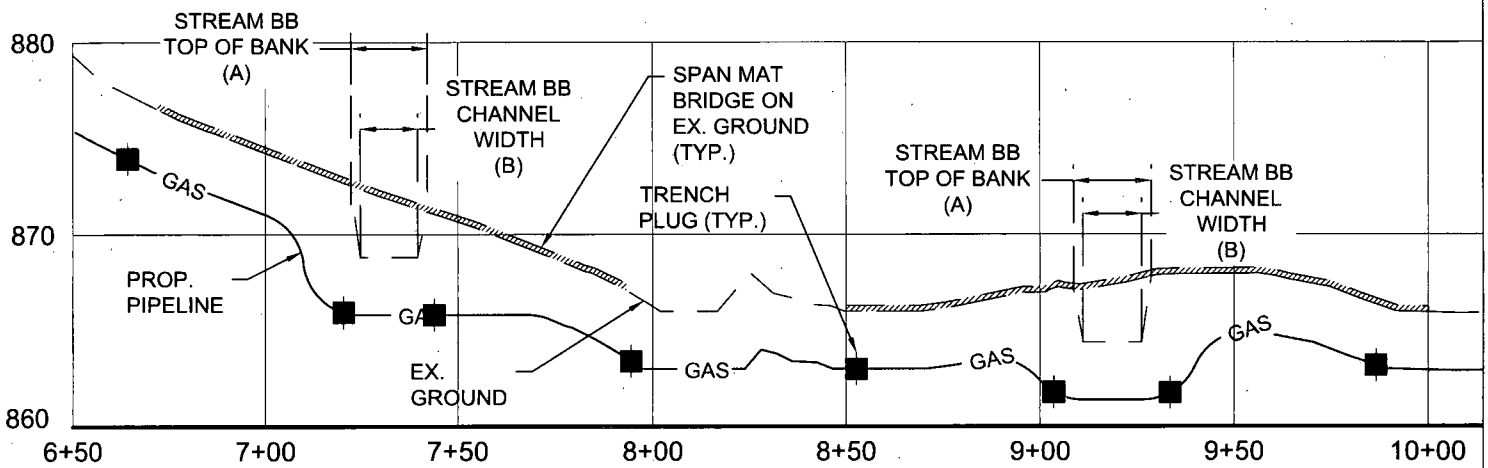
Date	No	REVISION RECORD
2016-02-18	01	REVISED PER WVDEP COMMENTS
2016-02-25	02	REVISED PER WVDEP COMMENTS
2016-03-02	03	REVISED PER WVDEP COMMENTS
	04	
	05	
	06	
	07	
	08	

GATEWAY[®]

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA

gatewayengineers.com 855-634-0284

© Gateway Engineers Inc. All Rights Reserved



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #2A
PROFILE

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN. 2016
Index Number:
Drawn By: TJS
Checked By: DMH
Project Manager: DMH

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
2016-02-18	01	REVISED PER WVDEP COMMENTS
2016-02-25	02	REVISED PER WVDEP COMMENTS
2016-03-02	03	REVISED PER WVDEP COMMENTS
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

APPENDIX M

APPENDIX D

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 2B

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 2B of 10

Site/Property Information:		
Legal Description: Large Forested Commercial Lot (Stream Crossing #2B)		
Physical Address/911 Address: Parcel Tax ID: 7-10-2		
Decimal Latitude/Longitude: 39.190123 N / 80.796942 W		
DMS Latitude/Longitude: 39° 11' 24.42" N / 80° 47' 48.96" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Commercial Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 2B of 10

Property Owner Data:		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

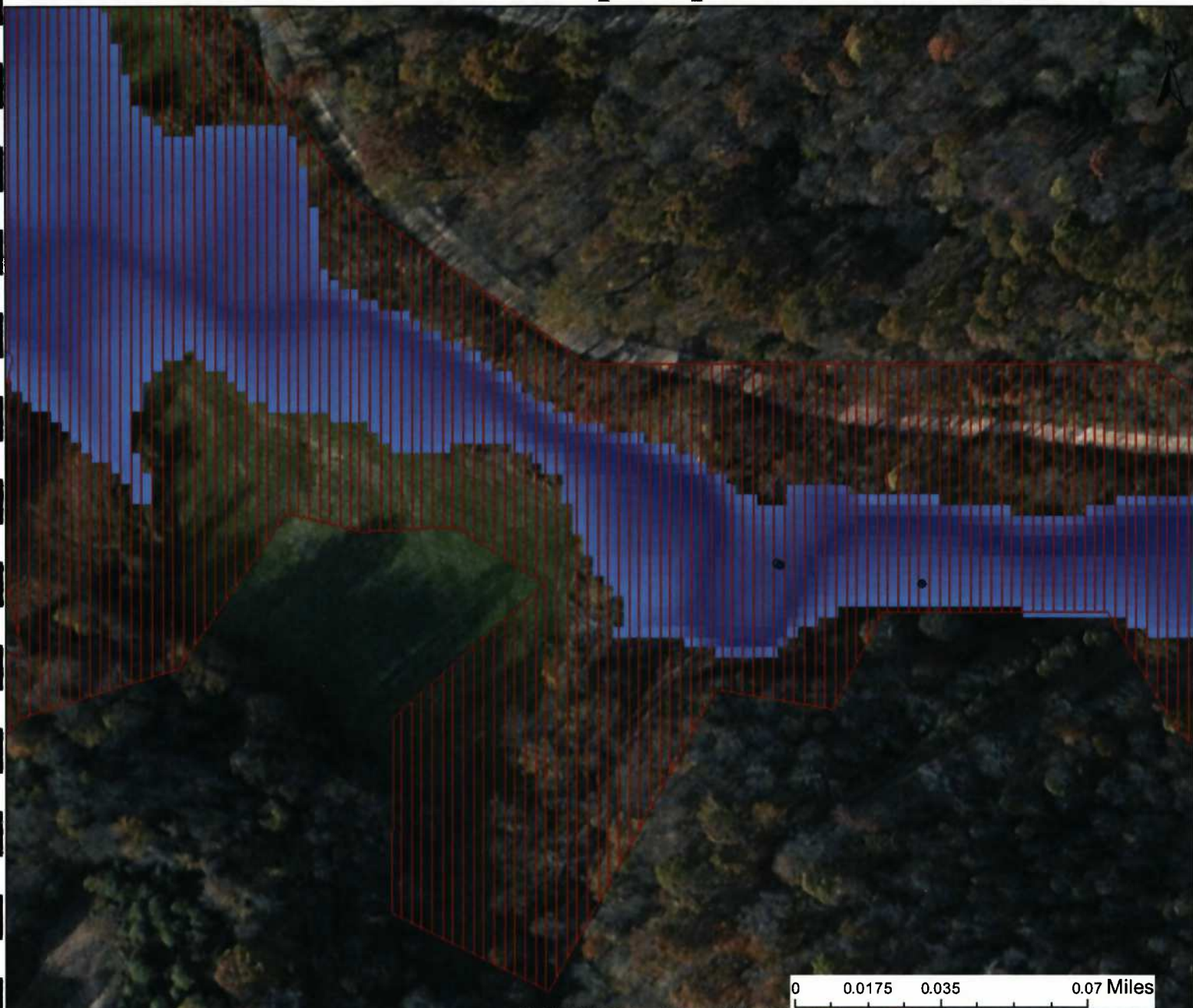
Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Robert Brannon ETAL		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Lucy E Harper		
Physical Address: 511 Boca Ciega Point Blvd N		
City: St. Petersburg	State: FL	Zip: 33708
PO Primary Phone: 727-398-6311		
PO Secondary Phone:		
PO Primary Email:		

WV Flood Map Impact 2B




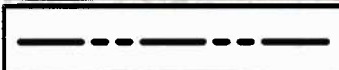





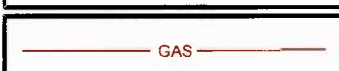
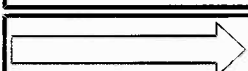
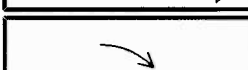




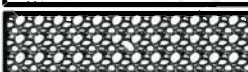
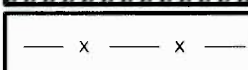

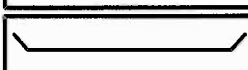

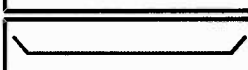


0 0.0175 0.035 0.07 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes:</p>	<p style="text-align: right;"><i>Map created on April 20, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: South Fork Hughes River</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Kanawha (5030203)</p> <p>Advisory Flood Height: About 873 ft</p> <p>Water Depth: About 5.5 ft (Source: HEC_RA)</p> <p>Elevation: About 868 ft</p> <p>Location (long, lat): (80.796942 W, 39.190123 N)</p> <p>Location (UTM 17N): (517536, 4337894)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: South Fork Hughes River</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: 18422-0011
 Drawing Scale: N.T.S.
 Date Issued: JAN 2018
 Issue Number:
 Drawn By: JES
 Checked By: DMH
 Project Manager: JSM

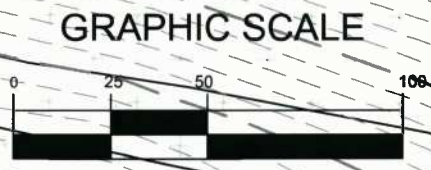
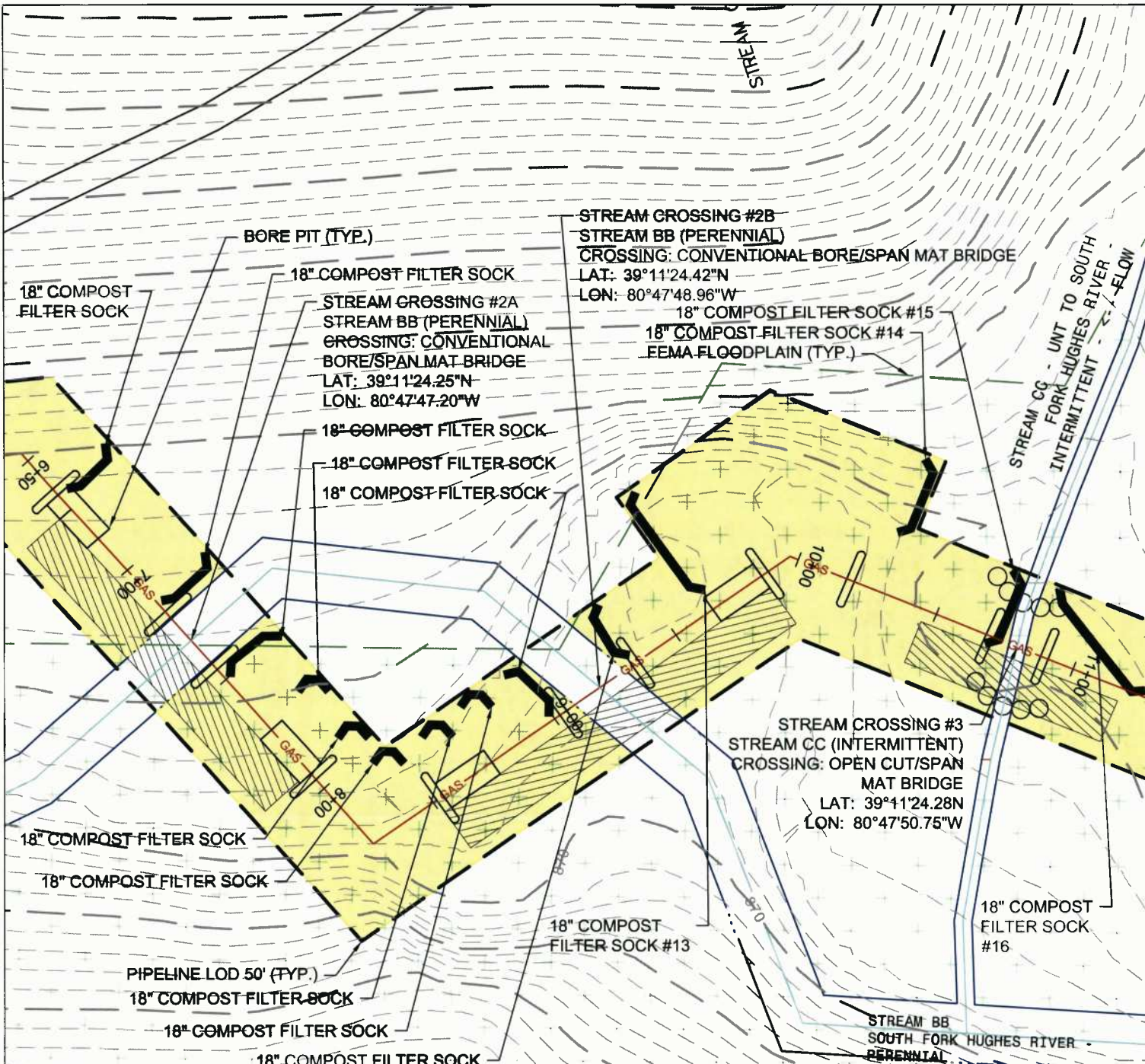
PREPARED FOR
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY®
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-6264

LEGEND



(IN FEET)
 1 inch = 50 ft.

STREAM CROSSING #2B
 PLAN

Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN 2016
 Index Number:
 Drawn By: TJS
 Checked By: DMH
 Project Manager: DMH

APPENDIX N

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

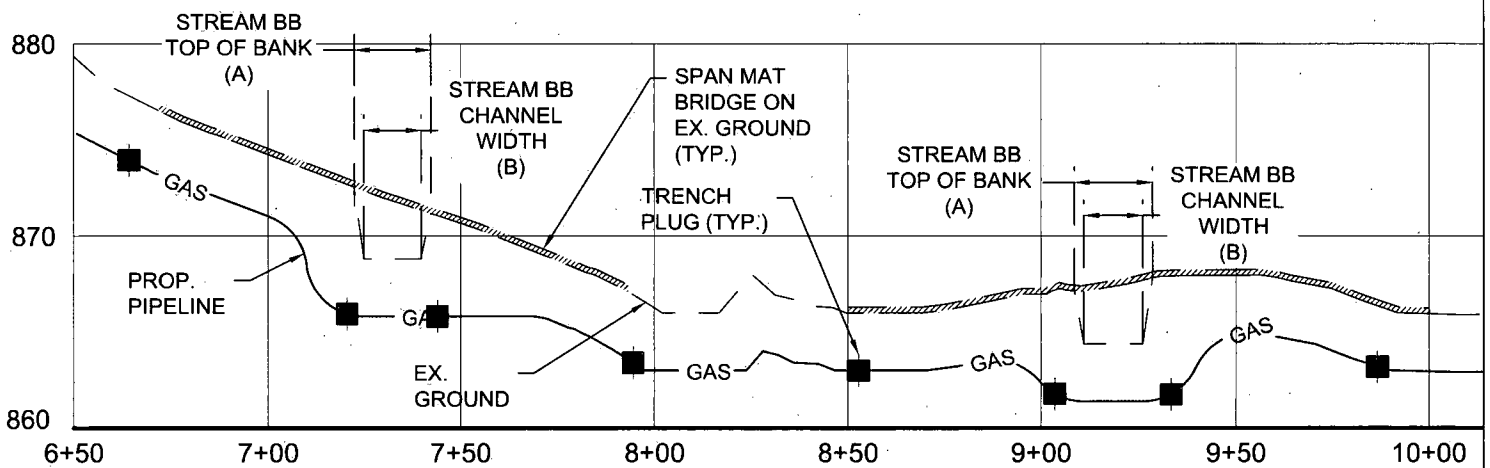
PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
2016-02-18	01	REVISED PER WVDEP COMMENTS
2016-02-25	02	REVISED PER WVDEP COMMENTS
2016-03-02	03	REVISED PER WVDEP COMMENTS
-	04	
-	05	
-	06	
-	07	
-	08	

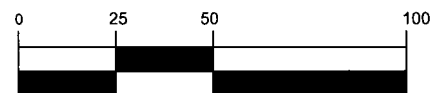
GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers Inc. All Rights Reserved



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #2B
PROFILE

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN. 2016
Index Number:
Drawn By: TJS
Checked By: DMH
Project Manager: DMH

APPENDIX N

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
2016-02-16	01	REVISED PER WVDEP COMMENTS
2016-02-25	02	REVISED PER WVDEP COMMENTS
2016-03-02	03	REVISED PER WVDEP COMMENTS
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY[®]
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

APPENDIX E
STREAM IMPACT TABLES

Table 1.1
Impacted Regulated Streams within the Project Area

Description	Designation ¹	Waterbody	Stream Type	Stream Classification ²	Approx. Station	Crossing Location	County	Nearest Intersection	Crossing Method	Top of Bank Width (feet)	Crossing Length (feet)	Fill Material (cu. ft)	Crossing Area (sq. ft)	Stream Dimensions ³			
														Channel Width (feet)	Channel Depth (feet)	Water Width (feet)	Water Depth (inches)
Crossing #1	Stream AA	UNT to South Fork Hughes River Creek	Intermittent	N/A	2+30	Lat 39°11'24.81" Lon -80°47'41.79"	Doddridge	CR 19 11 & Hughes River Rd	Open Cut Span Mat	2-4	63	73	252	1-3	1-3	1-3	0.08-0.16
Crossing #2	Stream BB	South Fork Hughes River	Perennial	WWF	3+68	Lat 39°11'24.68" Lon -80°47'43.39"	Doddridge	CR 23/3 & Haystack Ln	Conventional Bore Span Mat	10-20	N/A	N/A	N/A	8-15	1-3	6-12	.25-1
Crossing #2A	Stream BB	South Fork Hughes River	Perennial	WWF	7+32	Lat 39°11'24.25" Lon -80°47'47.20"	Doddridge	CR 23/3 & Haystack Ln	Conventional Bore/ Span Mat	10-20	N/A	N/A	N/A	8-15	1-3	6-12	.25-1
Crossing #2B	Stream BB	South Fork Hughes River	Perennial	WWF	9+19	Lat 39°11'24.42" Lon -80°47'48.96"	Doddridge	CR 23/3 & Haystack Ln	Conventional Bore/ Span Mat	10-20	N/A	N/A	N/A	8-15	1-3	6-12	.25-1
Crossing #3	Stream CC	UNT to South Fork Hughes River	Intermittent	N/A	10+80	Lat 39°11'24.28" Lon -80°47'50.75"	Doddridge	CR 19 11 & Hughes River Rd	Open Cut Span Mat	10-20	37	367	46	8-15	1-3	6-12	.25-1
Crossing #4	Stream BB	South Fork Hughes River Creek	Perennial	WWF	15+83	Lat 39°11'27.04" Lon -80°47'55.59"	Doddridge	CR 19 11 & Hughes River Rd	Conventional Bore Span Mat	3-6	N/A	N/A	N/A	7-8	1-2	DRY	DRY
Crossing #5	Stream DD	UNT to South Fork Hughes River	Ephemeral	N/A	21+05	Lat 39°11'31.60" Lon -80°47'58.68"	Doddridge	CR 19 11 & Hughes River Rd	Open Cut Span Mat	10-20	63	367	1260	8-15	1-3	6-12	.25-1
Crossing #6	Stream EE	UNT to South Fork Hughes River	Intermittent	WWF	24+46	Lat 39°11'33.81" Lon -80°48'01.58"	Doddridge	CR 19 11 & Hughes River Rd	Open Cut Span Mat	2-4	25	73	100	1-3	1-3	1-3	0.08-0.25
Crossing #7	Stream BB	South Fork Hughes River	Perennial	WWF	29+91	Lat 39°11'36.15" Lon -80°48'07.66"	Doddridge	CR 19 11 & Hughes River Rd	Conventional Bore Span Mat	10-20	N/A	N/A	N/A	8-15	1-3	6-12	.25-1
Crossing #8	Stream BB	South Fork Hughes River	Perennial	WWF	37+09	Lat 39°11'40.18" Lon -80°48'14.93"	Doddridge	CR 19 11 & Hughes River Rd	Conventional Bore Span Mat	10-20	N/A	N/A	N/A	8-15	1-3	6-12	.25-1
Crossing #9	Stream BB	South Fork Hughes River	Perennial	WWF	38+77	Lat 39°11'41.07" Lon -80°48'16.62"	Doddridge	CR 19 11 & Hughes River Rd	Conventional Bore Span Mat	10-20	N/A	N/A	N/A	8-15	1-3	6-12	.25-1
Crossing #10	Stream BB	South Fork Hughes River	Perennial	WWF	42+32	Lat 39°11'42.76" Lon -80°48'20.50"	Doddridge	CR 19 11 & Hughes River Rd	Conventional Bore Span Mat	10-20	N/A	N/A	N/A	8-15	1-3	6-12	.25-1
Total USACE Impacts											188	880	2,352 (0.05 AC)				

Notes:

1. This preliminary determination of jurisdictional status is based on the Corps/EPA JDI Guidebook instruction.
2. WWF – Warm Water Fishery, as classified by WV Requirements Governing Water Quality Standards Rule – Title 47CRS2.
3. All dimensions in the table are approximate.



GATEWAY

On Call. On Time. On Target.

(# 16-412 - A.)

EQM Gathering OpCo, LLC
(MOSA D002)

**Doddridge County WV Floodplain Development
Permit Application**

C-18422-0010

January 2016

MOSA D002 Pipeline

Doddridge County, West Virginia

PREPARED FOR

EQM Gathering OpCo, LLC.
625 Liberty Avenue
Suite 1700
Pittsburgh, PA 15222

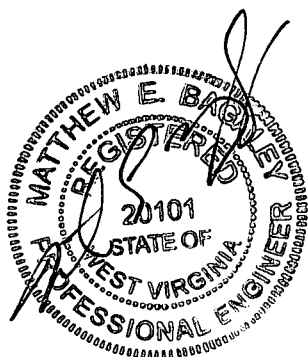
SUBMITTED BY

The Gateway Engineers, Inc.
400 Holiday Drive,
Suite 300
Pittsburgh, PA 15220
412.921.4030 PHONE
412.921.9960 FAX

www.gatewayengineers.com

REVIEWED BY

Matthew E. Bagaley, P.E.



A FULL-SERVICE CIVIL ENGINEERING FIRM

TABLE OF CONTENTS

	<u>Page No.</u>
Floodplain Development Permit Application	Appendix A
USGS Site Location Map	Appendix B
Development Site/Property Information – Impact 1	Appendix C
Development Site/Property Information – Impact 2	Appendix D
Development Site/Property Information – Impact 3	Appendix E
Development Site/Property Information – Impact 4	Appendix F
Unregulated Floodplain Impact Site Maps	Appendix G
Stream Impact Tables	Appendix H

APPENDIX A
FLOODPLAIN DEVELOPMENT PERMIT APPLICATION



Permit# 16-412 - A
Project Name: MOSA D002 Pipeline
Permittees Name: EQM Gathering

Doddridge County, WV

Floodplain Development Permit Application

This document is to be used for projects that impact/potentially impact the FEMA---designated floodplain and/or floodway of Doddridge County, WV pursuant to the rules and regulations established by all applicable Federal, State and local laws and ordinances, including the Doddridge County Floodplain Ordinance.

SECTION 1: GENERAL PROVISIONS (APPLICANT TO READ AND SIGN)

1. No work may start until a permit is issued.
2. The permit may be revoked if any false statements are made herein.
3. If revoked, all work must cease until permit is re-issued.
4. Development shall not be used or occupied until a Certificate of Compliance is issued.
5. The permit will expire if no work is commenced within six months of issuance.
6. Applicant is hereby informed that other permits may be required to fulfill local, state, and federal requirements.
7. Applicant hereby gives consent to the Floodplain Administrator/Manager or his/her representative to make inspections to verify compliance.
8. I THE APPLICANT CERTIFY THAT ALL STATEMENTS HEREIN AND IN ATTACHMENTS TO THIS APPLICATION ARE, TO THE BEST OF MY KNOWLEDGE, TRUE AND ACCURATE.

APPLICANT'S SIGNATURE  (AGENT)

DATE 1/15/16

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Applicant Information:

Please provide all pertinent data.

Applicant Information		
Responsible Company Name: EQM Gathering OpCo, LLC		
Corporate Mailing Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
Corporate Point of Contact (POC): Matt Hoover		
Corporate POC Title: Sr. Environmental Coordinator		
Corporate POC Primary Phone: (724) 873-3009		
Corporate POC Primary Email: mhoover@eqt.com		
Corporate FEIN: 37-1661577	Corporate DUNS:	
Corporate Website: www.eqt.com		
Local Mailing Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
Local Project Manager (PM): Matthew E. Bagaley, P.E.		
Local PM Primary Phone: (412) 921-4030		
Local PM Secondary Phone:		
Local PM Primary Email: mbagaley@gatewayengineers.com		
Person Filing Application: Matt Hoover		
Applicant Title: Sr. Environmental Coordinator		
Applicant Primary Phone: (724)873-3009		
Applicant Secondary Phone:		
Applicant Primary Email: mhoover@eqt.com		

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Project Narrative:

Describe in detail the proposed development including project name/title, type of development, estimated start and completion timeline, and its potential impact on the floodplain. Use additional copies of this page as needed.

Project Narrative:

The project proponent, EQM Gathering OpCo, LLC. is proposing to install approximately 2.5 miles of 16-inch diameter steel pipeline and improve approximately 1.2 miles of existing gravel access roads. An additional 1.7 miles of existing access road will be used and maintained. The project includes eleven stream crossings including open cut, conventional boring, span mats, and utilizing existing culverts and ford crossings. Of the eleven stream crossings, four of them are impacting regulated floodplains. The limits of disturbance will encompass approximately 38.2 acres. Location and site maps are attached. The project will begin February 2016 and end September 2016. Construction cost for these crossings estimated at \$155,000 equating to a permit fee of \$755.

Impact #1: (Referenced as Crossing #6 – Stream C in Appendix B & C) – Crossing is proposed as a conventional bore of Middle Island Creek, a perennial stream.

Impact #2: (Referenced as Crossing #7 – Stream G in Appendix B & D) – Crossing is an existing culvert with a span mat, if necessary, of UNT to Arnold Creek, an intermittent stream.

Impact #3: (Referenced as Crossing #10 – Stream F in Appendix B & E) – Crossing is an existing ford crossing with a span mat, if necessary, of Arnold Creek, a perennial stream.

Impact #4: (Referenced as Crossing #11 – Stream E in Appendix B & F) – Crossing is an existing ford with a span mat, if necessary, of UNT to Arnold Creek, an intermittent stream.

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Proposed Development:

Please check all elements of the proposed project that apply.

DESCRIPTION OF WORK (CHECK ALL APPLICABLE BOXES)

A. STRUCTURAL DEVELOPMENT

<u>ACTIVITY</u>	<u>STRUCTURAL TYPE</u>
<input type="checkbox"/> New Structure	<input type="checkbox"/> Residential (1 – 4 Family)
<input type="checkbox"/> Addition	<input type="checkbox"/> Residential (more than 4 Family)
<input type="checkbox"/> Alteration	<input type="checkbox"/> Non-residential (floodproofing)
<input type="checkbox"/> Relocation	<input type="checkbox"/> Combined Use (res. & com.)
<input type="checkbox"/> Demolition	<input type="checkbox"/> Replacement
<input type="checkbox"/> Manufactured/Mobil Home	

B. OTHER DEVELOPMENT ACTIVITIES:

- Fill Mining Drilling Pipelining
- Grading
- Excavation (except for STRUCTURAL DEVELOPMENT checked above)
- Watercourse Alteration (including dredging and channel modification)
- Drainage Improvements (including culvert work)
- Road, Street, or Bridge Construction
- Subdivision (including new expansion)
- Individual Water or Sewer System
- Other (please specify)

Construction cost for these crossings estimated at \$155,000 equating to a permit fee of \$755.

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Contractor Data:

Please provide all pertinent data for contractors and sub---contractors that may be participating in this project. Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: Applicable for all impacts

Contractor/Sub-Contractor (C/SC) Information:		
C/SC Company Name:		
C/SC WV License Number:		
C/SC FEIN:	C/SC DUNS:	
Local C/SC Point of Contact (POC):		
Local C/SC POC Title:		
C/SC Mailing Address:		
City:	State:	Zip-Code:
Local C/SC Office Phone:		
Local C/SC POC Phone:		
Local C/SC POC E-Mail:		

Engineer Firm Information:		
Engineer Firm Name: The Gateway Engineers, Inc.		
Engineer WV License Number: 20101		
Engineer Firm FEIN: 25-1006946	Engineer Firm DUNS: 06-684-3053	
Engineer Firm Primary Point of Contact (POC): Matthew E. Bagaley, P.E.		
Engineer Firm Primary POC Title: Project Manager		
Engineer Firm Mailing Address: 400 Holiday Drive, Suite 300		
City: Pittsburgh	State: PA	Zip-Code: 15220-2727
Engineer Firm Office Phone: (412) 921-4030		
Engineer Firm Primary POC Phone: (412) 921-4030 ext. 153		
Engineer Firm Primary POC E-Mail: mbagaley@gatewayengineers.com		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Site Plan

A Site Plan is an accurate and detailed map of the proposed development for this project. It shows the size, shape, location and special features of the project property, and the size and location of any development planned to the property, especially as that development will impact the floodplain and/or floodway. Site plans show what currently exists on the project property, and any changes or improvements you are proposing to make. **A certified and licensed engineering firm should complete site plans.**

A SITE PLAN MUST CONTAIN THE FOLLOWING INFORMATION:

1. Legal description of the parcel, north arrow and scale
2. All property lines and their dimensions
3. Names of adjacent roads, location of driveways
4. Location of sloughs, tributaries, streams, rivers, wetlands, ponds, and lakes, with setbacks indicated, and including FEMA floodplain data based on most updated FIRM.
5. Location, size, shape of all buildings, existing and proposed, with elevation of lowest floor indicated.
6. Location and dimensions of existing or proposed on-site sewage systems.
7. Location of all propane tanks, fuel tanks or other liquid storage tanks whether above ground or below ground level.
8. Location and dimensions of any proposed pipeline placement(s) into floodplain/floodway.
9. Location and dimensions of any roadway development into floodplain/floodway. *(Includes initial development access roads)*
10. Location and dimensions of any bridge and/or culvert development into floodplain/floodway.
11. Location and dimensions of any storage yard or facility into the floodplain/floodway.
12. Location of any existing utilities and/or proposed utility placement and/or displacement.
13. Location, dimensions and depth of any existing or proposed fill on site.
14. A survey showing the **existing ground elevations** of at least location on the building site. **ELEVATION NOTE:** All vertical datum will reference either NGVD 29 or NAVD 88. Assumed datum will not be acceptable unless the property is located in an area where vertical datum has not been published. For those areas where vertical datum has not been established, a site plan with contours, elevations using assumed datum, high water marks and existing water levels of sloughs, rivers, lakes or streams and proposed lowest floor elevation.

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Applicant

Please read print name, sign and date below:

- I certify that I am authorized to submit this application for the primary project developer.
- I certify that the information included in this application is to the best of my knowledge true and complete.
- I certify that all required Federal, State, and local permits required by law and/or ordinance for the above described development of this project have been properly attained, are current and valid, and must be presented with this application before a Doddridge County Floodplain Permit may be issued.
- I understand that if in the course of the development project additional permits become required that were not needed during the initial proposal, the primary developer must notify the Doddridge County Floodplain Manager within 48 hours of such need, and that a "Stop Work" order may be issued for all project work directly impacting the floodplain or floodway, until such time the required additional permits are acquired.
- I understand that once the floodplain permit is submitted, the application will be entered into official public record at the next regularly scheduled Doddridge County Commission meeting after the date of submittal.
- I understand that from the date of submittal of the fully completed permit application, the Doddridge County Floodplain Manager has ninety (90) days to make a determination to either grant or deny said permit application. During this approval period, the Doddridge County Floodplain Manager may, at his or her discretion, conduct a review and/or additional study of provided documentation by means of an independent engineering firm. All costs associated with said review and/or study must be reimbursed to the County before issuance of approved permit.
- I understand that during the approval period, the Doddridge County Floodplain Manager of designee may at his or her discretion conduct site visits and document conditions of proposed development pursuant to the permit application.
- I understand that once the Floodplain Permit is granted, the permit will be entered into official public record at the next scheduled Doddridge County Commission meeting after the date of issuance. Appeals to the permit may be made no later than twenty (20) days after said issuance. If a valid appeal is submitted, as determined by the Doddridge County Floodplain Manager, a "Stop Work" order will be issued for all project development directly involving the floodplain or floodway. A public hearing by the Doddridge County Appeals Board will be scheduled no less than ten (10) days after the next regularly scheduled Doddridge County Commission meeting.
- I understand that all decisions of the Doddridge County Appeals Board shall be final.
- **I understand issuance of a Floodplain Permit authorizes me to proceed with construction as proposed. A Certificate of Compliance is required upon substantial completion of the project.**
- In signing this application, the primary developer hereby grants the Doddridge County Floodplain Manager or designee the right to enter onto the above---described location to inspect the development work proposed, in progress, and/or completed.
- I understand that if I do not follow exactly the site---plan submitted and approved by this permit that a "Stop Work" order may be issued by the Wirt County Floodplain Manager and that I must stop all construction immediately until discrepancies of actual work vs. proposed work is resolved.

Applicant Signature:  (AGENT) Date: 1/15/16

Applicant Printed Name: MATT BAGALEY

APPENDIX B
USGS SITE LOCATION MAP



ARNOLD CREEK

NUTTER FORK

STREAM CROSSING #11
STREAM E (INTERMITTENT)
(REGULATED FLOODPLAIN)
CROSSING: EXISTING FORD
LAT: 39°19'24.50"N
LO: 80°49'27.62"W

PROJECT AREA 38.20 ACRES

LAT: 39°19'29.16"
 LON: -80°48'32.00"

STREAM CROSSING #10
STREAM F (PERENNIAL)
(REGULATED FLOODPLAIN)
CROSSING: EXISTING FORD
LAT: 39°19'23.62"N
LO: 80°49'28.21"W

STREAM B NOT IMPACTED

STREAM CROSSING #6
STREAM C (PERENNIAL)
(REGULATED FLOODPLAIN)
CROSSING: BORE
LAT: 39°19'22.26"N
LO: 80°48'39.44"W

STREAM CROSSING #5
STREAM UU (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT, SPAN MAT BRIDGE
LAT: 39°19'17.38"N
LO: 80°49'07.33"W

STREAM A NOT IMPACTED

MIDDLE ISLAND CREEK

STREAM CROSSING #8
STREAM D (INTERMITTENT)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING CULVERT
LAT: 39°18'50.67"N
LO: 80°48'54.96"W

STREAM CROSSING #9
STREAM H (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: SPAN MAT
LAT: 39°18'51.56"N
LO: 80°49'03.73"W

STREAM CROSSING #4
STREAM L (INTERMITTENT)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT, SPAN MAT BRIDGE
LAT: 39°18'49.92"N
LO: 80°48'56.64"W

STREAM CROSSING #7
STREAM G (INTERMITTENT)
(REGULATED FLOODPLAIN)
CROSSING: EXISTING CULVERT
LAT: 39°18'47.87"N
LO: 80°49'16.12"W

PROPOSED 16" MOSA D002 PIPELINE

STREAM CROSSING #3
STREAM J (INTERMITTENT)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT, SPAN MAT BRIDGE
LAT: 39°18'25.55"N
LO: 80°49'05.50"W

ROCK RUN

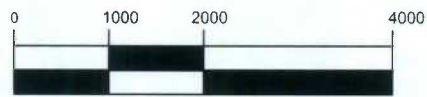
STREAM CROSSING #2
STREAM P (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT, SPAN MAT BRIDGE
LAT: 39°18'09.53"N
LO: 80°49'20.96"W

STREAM CROSSING #1
STREAM O (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT, SPAN MAT BRIDGE
LAT: 39°18'09.56"N
LO: 80°49'21.33"W

LAT: 39°18'01.26"
 LON: -80°49'22.18"

SATURN COMPRESSOR STATION

GRAPHIC SCALE



(IN FEET)
 1 inch = 2000 ft.

GLASSPORT QUAD

STREAM IMPACT LOCATION MAP
 Project Number: C-18422-0010
 Drawing Scale: 1" = 200'
 Date Issued: NOV 2015
 Index Number:
 Drawn By: MEB
 Checked By: MEB
 Project Manager: MEB

MOSA D002 PIPELINE
 JEFFERSON HILLS TOWNSHIP, ALLEGHENY COUNTY, PA
 UNION TOWNSHIP, WASHINGTON COUNTY, PA
 PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers Inc. All Rights Reserved

APPENDIX C

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 1

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 1 of 4

Site/Property Information:		
Legal Description: Vacant Lot (Stream Crossing #6)		
Physical Address/911 Address:		
Decimal Latitude/Longitude: 39.322887 N / 80.811020 W		
DMS Latitude/Longitude: 39° 19' 22.26" N / 80° 48' 39.44" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Vacant Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 1 of 4

Property Owner Data:		
Name of Primary Owner (PO): Thomas K Porter		
PO Address: 457 Cedar Lane		
City: West Union	State: WV	Zip: 26456-8946
PO Primary Phone: 304-873-1228		
PO Secondary Phone:		
PO Primary Email: tkporterwv@gmail.com		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Joel W and Bonnie Ostroff		
Physical Address: 2912 Joyce Road		
City: Abington	State: PA	Zip: 19001
PO Primary Phone: 215-657-3692		
PO Secondary Phone:		
PO Primary Email: joel.estroff@gmail.com		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Equitrans Inc.		
Physical Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 412-553-5700		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Equitrans Inc.		
Physical Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 412-553-5700		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Randall and Dixie Craig Lynch		
Physical Address: 5534 WV Rt 18 North		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-2105		
PO Secondary Phone: 304-588-4337		
PO Primary Email:		

LEGEND

	TURNOUT
	COMPOST FILTER SOCK
	STANDARD SILT FENCE
	REINFORCED SILT FENCE
	SUPER SILT FENCE
	12" COMPOST FILTER SOCK
	TRENCH PLUG
	STONE CONSTRUCTION ENTRANCE
	WATERBAR
	SANDBAG DIVERSION
	SPAN MAT BRIDGE
	LIMITS OF DISTURBANCE
	PROPERTY LINE
	EXISTING STREAM
	HISTORICAL GEOTECHNICAL ISSUES
	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS/PFO WETLANDS
	EXISTING CONTOURS
	FEMA FLOODPLAIN
	DIVERSION BERM
	PROPOSED PIPELINE

NWP-12 PLAN LEGEND

Project Number: C-18422-0010
 Drawing Scale: 1" = 5'
 Date Issued: NOV 2015
 Index Number: _____
 Drawn By: ZCK
 Checked By: MEB
 Project Manager: MEB

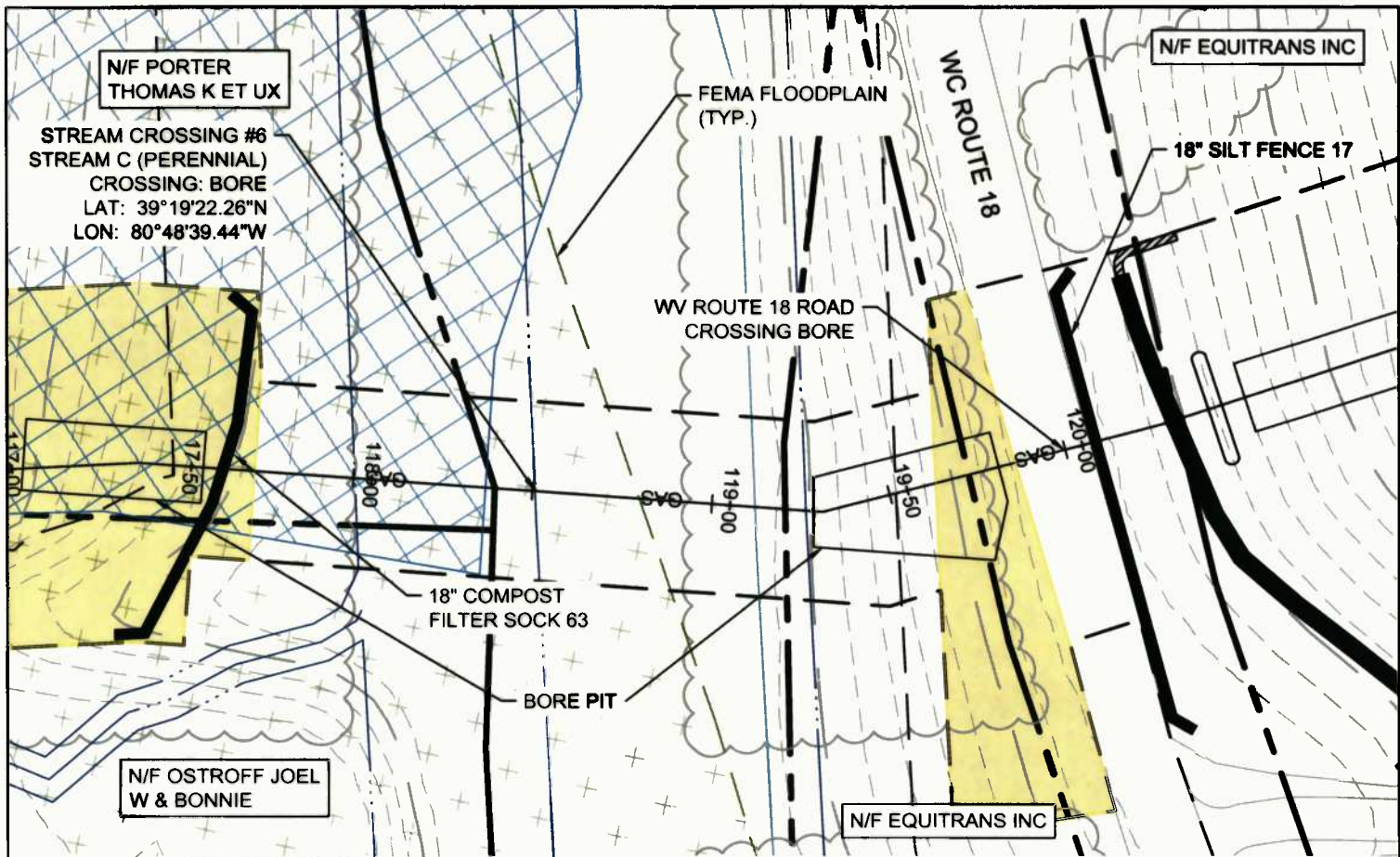
MOSA D002 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



N/F PORTER
THOMAS K ET UX

N/F EQUITRANS INC

STREAM CROSSING #6
STREAM C (PERENNIAL)
CROSSING: BORE
LAT: 39°19'22.26"N
LON: 80°48'39.44"W

FEMA FLOODPLAIN
(TYP.)

18" SILT FENCE 17

WV ROUTE 18 ROAD
CROSSING BORE

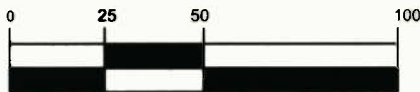
18" COMPOST
FILTER SOCK 63

BORE PIT

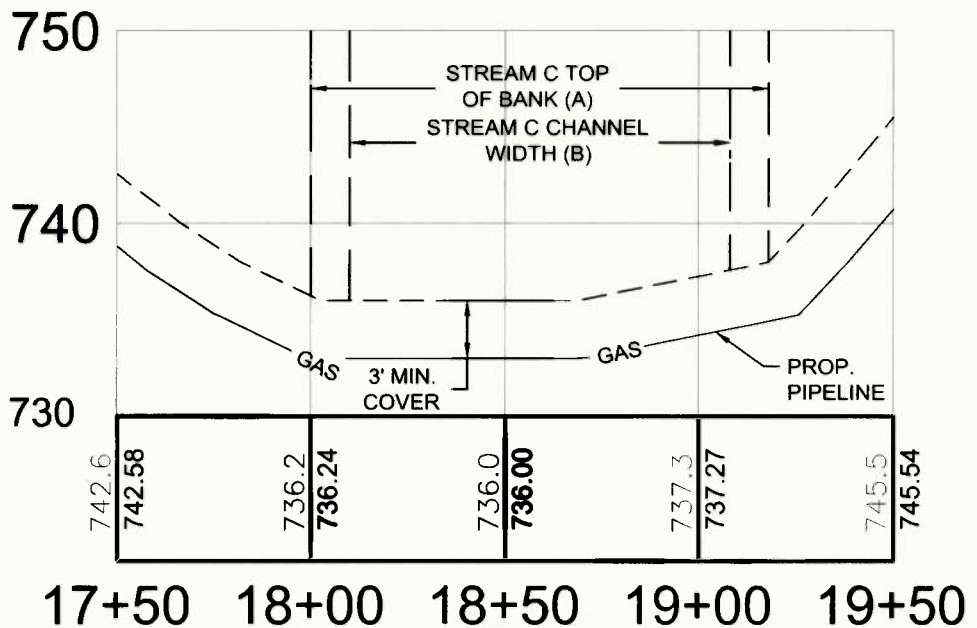
N/F OSTROFF JOEL
W & BONNIE

N/F EQUITRANS INC

GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.



NOTE:
THE PROPOSED PROJECT IS FOR THE
INSTALLATION OF A NATURAL GAS
PIPELINE. UPON INSTALLATION, THE
FLOODPLAIN WILL BE RETURNED TO ITS
PRE-CONSTRUCTION CONDITION.

STREAM CROSSING #6

MOSA D002 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

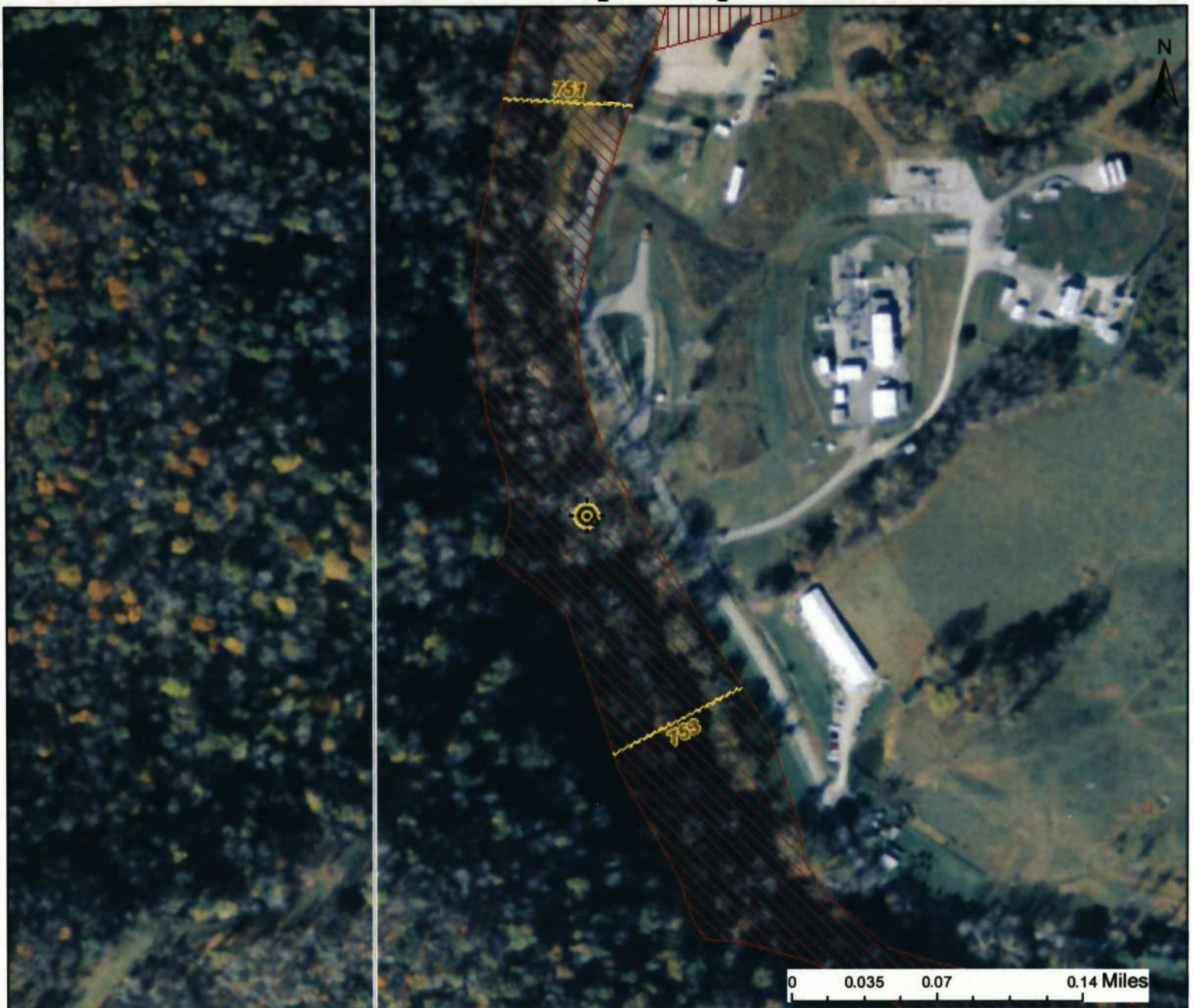
Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-8284

APPENDIX C

WV Flood Map - Impact 1



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p>Legend:</p> <ul style="list-style-type: none"> — Cross Section (XS) Lines - - - Base Flood Elevation (BFE) Lines Floodway <p>Flood Hazard Zone</p> <ul style="list-style-type: none"> Approximate Study (Zone A) Detailed Study (AE, AH, AO) Community Rating System Areas <p>Location of flood information</p> <ul style="list-style-type: none"> ⊙ Location of flood information <p>User Notes:</p> <ul style="list-style-type: none"> Stream Crossing #6 		<p><i>Map created on January 6, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: AE</p> <p>Stream: Middle Island Creek</p> <p>FEMA Issued Flood Map: 54017C0110C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 736 ft</p> <p>Location (long, lat): (80.811020 W, 39.322887 N)</p> <p>Location (UTM 17N): (516290, 4352625)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: 54017_021</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>		

APPENDIX D

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 2

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 2 of 4

Site/Property Information:		
Legal Description: Residential (Stream Crossing #7)		
Physical Address/911 Address: Parcel Tax ID: 1-4-23		
Decimal Latitude/Longitude: 39.313342 N / 80.821212 W		
DMS Latitude/Longitude: 39° 18' 47.87" N / 80° 49' 16.12" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Residential		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 2 of 4

Property Owner Data:		
Name of Primary Owner (PO): Ralph M. and Rita E. Hiley		
PO Address: 93 Pineview Drive		
City: Parkersburg	State: WV	Zip: 26101
PO Primary Phone: 304-863-6311		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Johnathan L. and Jeffery W. M.		
Physical Address: 3175 Sam Cavins Road		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1841		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Jack G. and Virginia M. Ash		
Physical Address: 1414 Washington Gardens Circle		
City: Washington	State: WV	Zip: 26181
PO Primary Phone: 304-863-6455		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Michael Shepherd		
Physical Address: 4978 Long Run Road		
City: Pennsboro	State: WV	Zip: 26415
PO Primary Phone: 304-873-2415		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Edward Jr. and Maudennal Smith Kelly		
Physical Address: PO Box 419		
City: Accoville	State: WV	Zip: 25606
PO Primary Phone: 304-664-8371		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	TURNOUT
	COMPOST FILTER SOCK
	STANDARD SILT FENCE
	REINFORCED SILT FENCE
	SUPER SILT FENCE
	12" COMPOST FILTER SOCK
	TRENCH PLUG
	STONE CONSTRUCTION ENTRANCE
	WATERBAR
	SANDBAG DIVERSION
	SPAN MAT BRIDGE
	LIMITS OF DISTURBANCE
	PROPERTY LINE
	EXISTING STREAM
	HISTORICAL GEOTECHNICAL ISSUES
	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS/PFO WETLANDS
	EXISTING CONTOURS
	FEMA FLOODPLAIN
	DIVERSION BERM
	PROPOSED PIPELINE

NWP-12 PLAN LEGEND

Project Number: C-18422-0010
 Drawing Scale: N.T.S.
 Date Issued: NOV. 2015
 Index Number: ---
 Drawn By: JDS
 Checked By: MEB
 Project Manager: MEB

MOSA D002 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

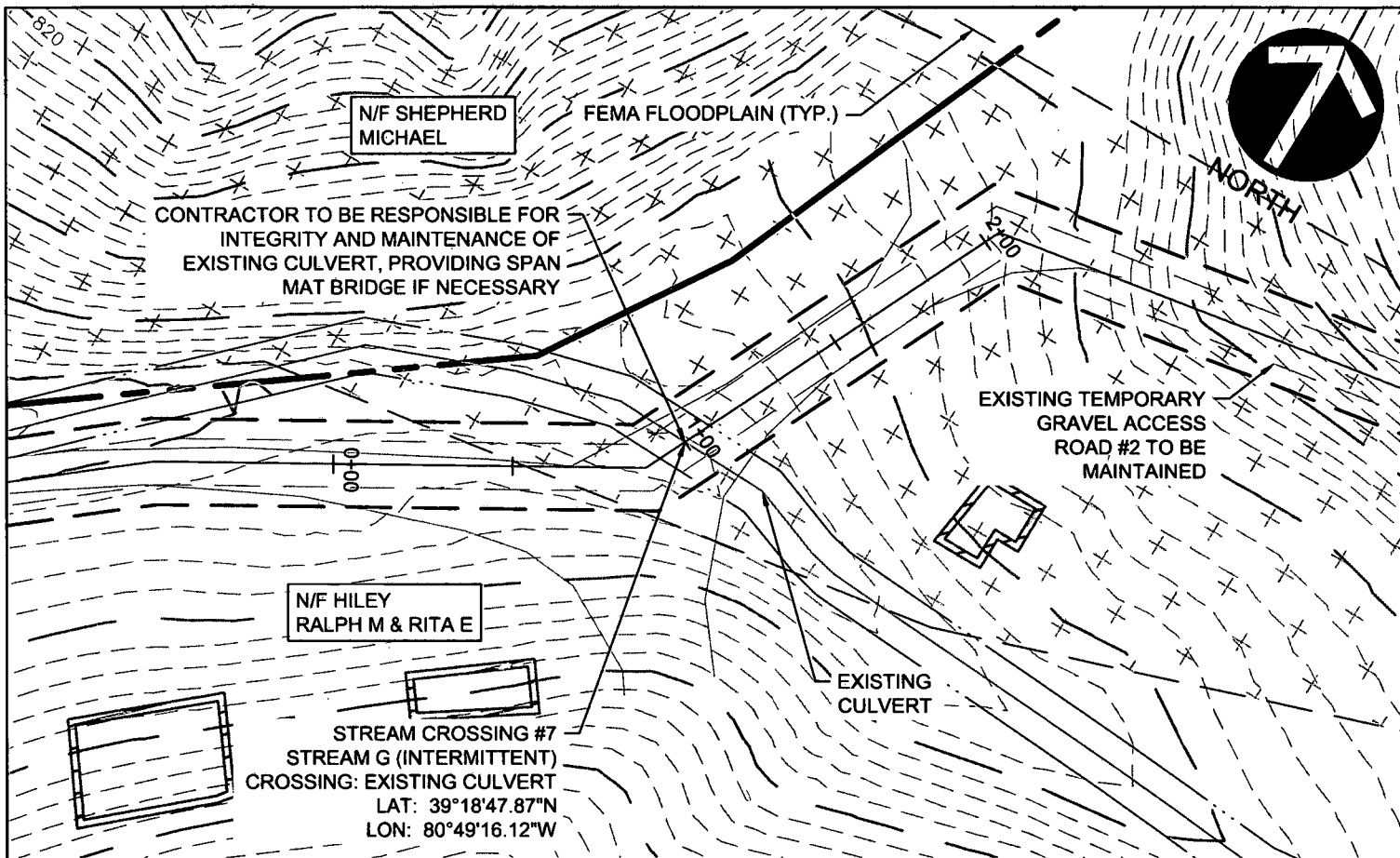
Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



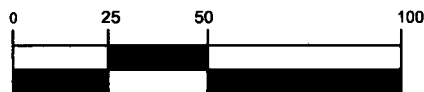
GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

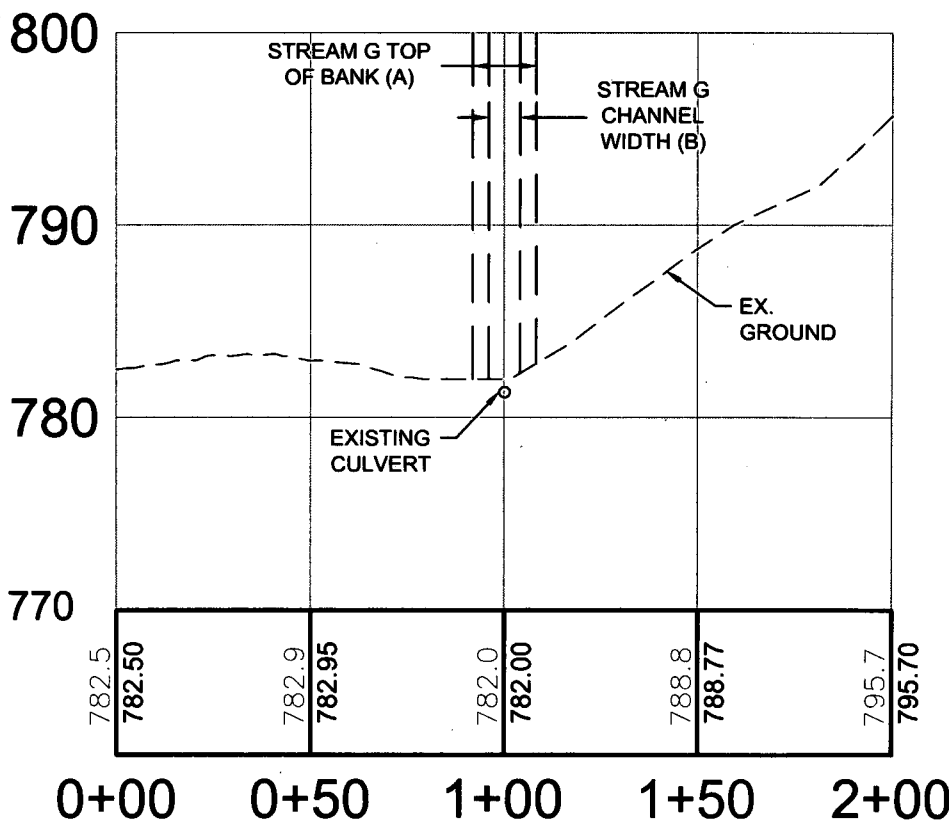
© Gateway Engineers Inc. All Rights Reserved



GRAPHIC SCALE



(IN FEET)
 1 inch = 50 ft.



NOTE:
 THE PROPOSED PROJECT IS FOR THE INSTALLATION OF A NATURAL GAS PIPELINE. UPON INSTALLATION, THE FLOODPLAIN WILL BE RETURNED TO ITS PRE-CONSTRUCTION CONDITION.

STREAM CROSSING #7

MOSA D002 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: C-18422-0010
 Drawing Scale: 1"=50'
 Date Issued: NOV, 2015
 Index Number:
 Drawn By: ZDR
 Checked By: MEB
 Project Manager: MEB

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

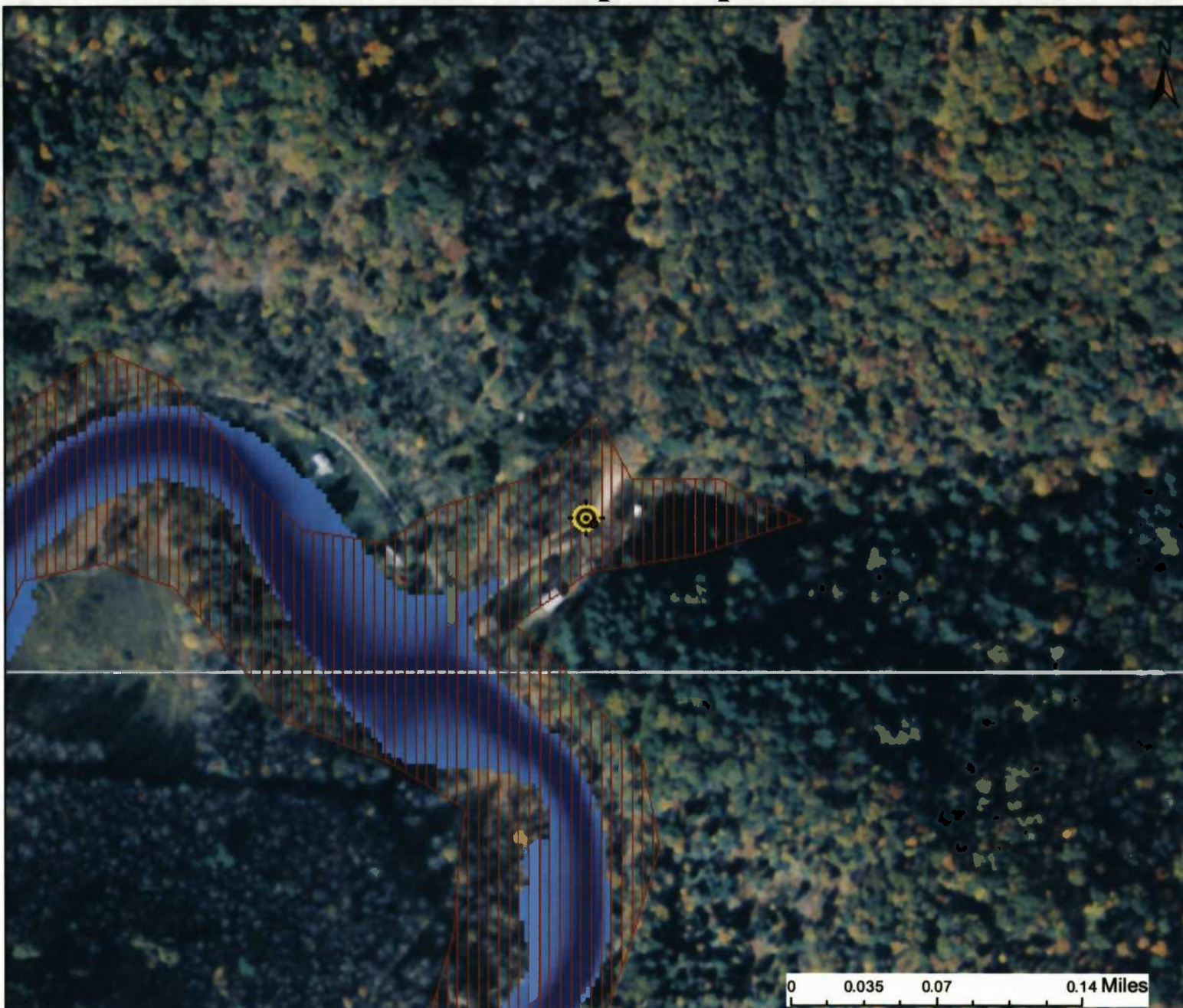
Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

APPENDIX D

WV Flood Map - Impact 2



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool</i> (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #7</p>	<p style="text-align: right;"><i>Map created on January 6, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A</p> <p>Stream: Arnold Creek</p> <p>FEMA Issued Flood Map: 54017C0105C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 785 ft</p> <p>Location (long, lat): (80.821212 W, 39.313342 N)</p> <p>Location (UTM 17N): (515413, 4351564)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: Arnold Creek</p> <p>Parcel Number:</p>
--	--	--	--

APPENDIX E

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 3

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 3 of 4

Site/Property Information:		
Legal Description: Residential (Stream Crossing #10)		
Physical Address/911 Address:		
Decimal Latitude/Longitude: 39.323277 N / 80.824581 W		
DMS Latitude/Longitude: 39° 19' 23.62" N / 80° 49' 28.21" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Vacant Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 3 of 4

Property Owner Data:

Name of Primary Owner (PO): James Carl Life

PO Address: 510 Sam Cavins Road

City: West Union

State: PA

Zip: 26456

PO Primary Phone: 304-873-1296

PO Secondary Phone:

PO Primary Email:

Surface Rights Owner Data:

Name of Primary Owner (PO): N/A

PO Address:

City:

State:

Zip:

PO Primary Phone:

PO Secondary Phone:

PO Primary Email:

Mineral Rights Owner Data: (As Applicable)

Name of Primary Owner (PO): N/A

PO Address:

City:

State:

Zip:

PO Primary Phone:

PO Secondary Phone:

PO Primary Email:

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Eugene Vance Chipps ET UX		
Physical Address: 304 Tymber Creek Road		
City: Clarksburg	State: WV	Zip: 26301
PO Primary Phone: 304-641-1360		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Eugene Vance Chipps II		
Physical Address: 304 Tymber Creek Road		
City: Clarksburg	State: WV	Zip: 26301
PO Primary Phone: 304-641-1360		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): John G. Kelley		
Physical Address: 602 James Kelley Lane		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1837		
PO Secondary Phone:		
PO Primary Email: jerrileekelley@gmail.com		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Carlie and Karen M. James		
Physical Address: 151 Kelley James Lane		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-2447		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	TURNOUT
	COMPOST FILTER SOCK
	STANDARD SILT FENCE
	REINFORCED SILT FENCE
	SUPER SILT FENCE
	12" COMPOST FILTER SOCK
	TRENCH PLUG
	STONE CONSTRUCTION ENTRANCE
	WATERBAR
	SANDBAG DIVERSION
	SPAN MAT BRIDGE
	LIMITS OF DISTURBANCE
	PROPERTY LINE
	EXISTING STREAM
	HISTORICAL GEOTECHNICAL ISSUES
	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS/PFO WETLANDS
	EXISTING CONTOURS
	FEMA FLOODPLAIN
	DIVERSION BERM
	PROPOSED PIPELINE

NWP-12 PLAN LEGEND

Project Number: C-18422-0010
 Drawing Scale: 1" = 10'
 Date Issued: NOV. 2015
 Index Number: _____
 Drawn By: ZDR
 Checked By: MEB
 Project Manager: MEB

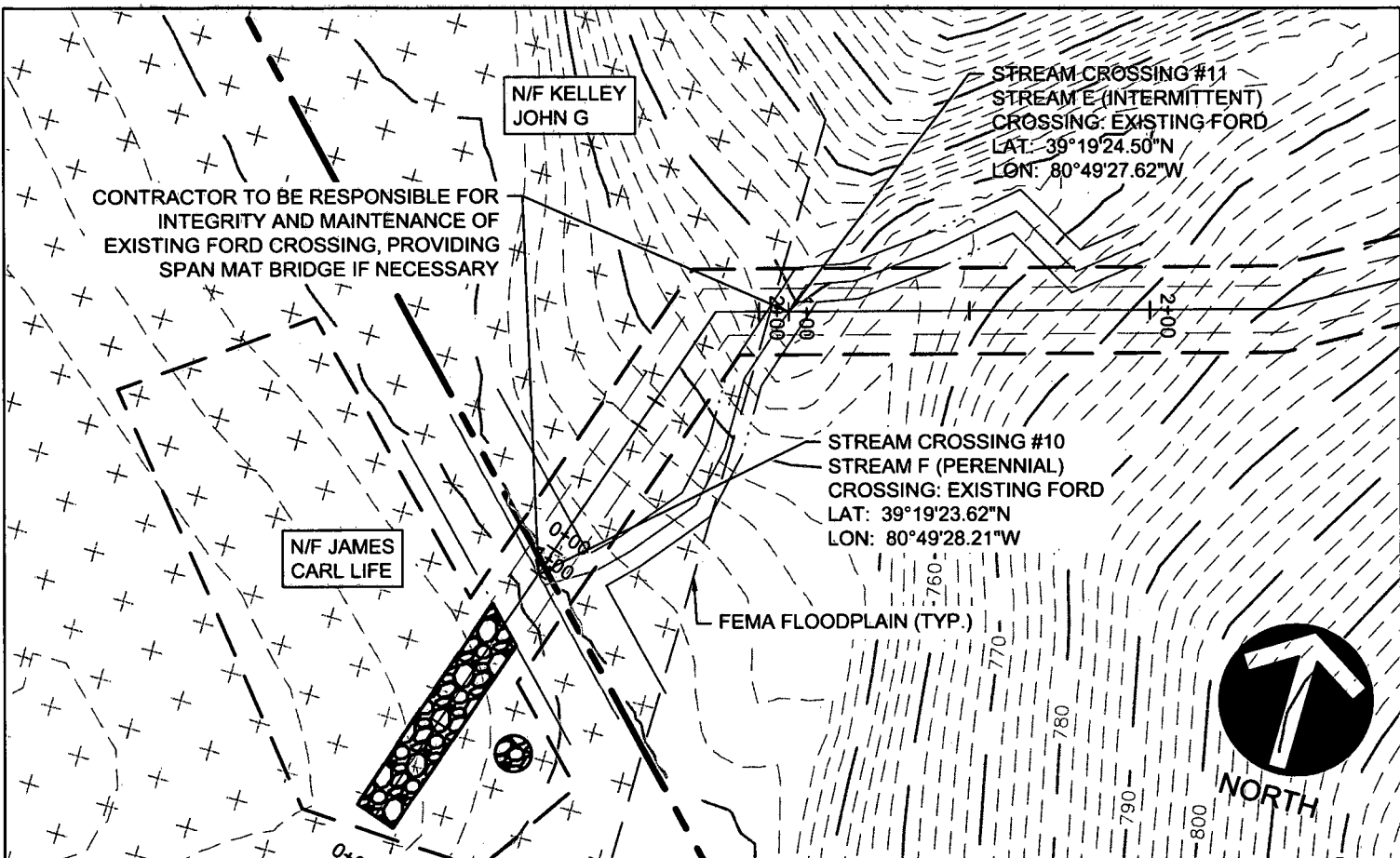
MOSA D002 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-8284



CONTRACTOR TO BE RESPONSIBLE FOR INTEGRITY AND MAINTENANCE OF EXISTING FORD CROSSING, PROVIDING SPAN MAT BRIDGE IF NECESSARY

STREAM CROSSING #11
 STREAM E (INTERMITTENT)
 CROSSING: EXISTING FORD
 LAT: 39°19'24.50"N
 LON: 80°49'27.62"W

STREAM CROSSING #10
 STREAM F (PERENNIAL)
 CROSSING: EXISTING FORD
 LAT: 39°19'23.62"N
 LON: 80°49'28.21"W

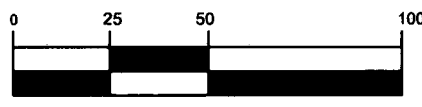
N/F JAMES CARL LIFE

N/F KELLEY JOHN G

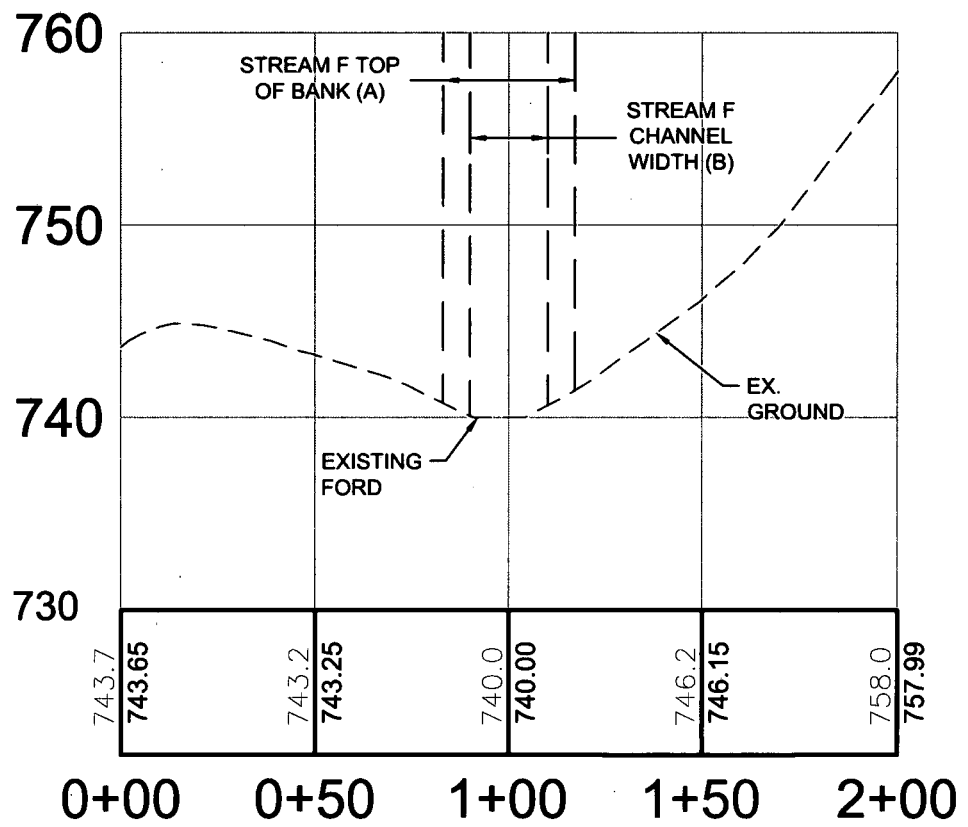
FEMA FLOODPLAIN (TYP.)



GRAPHIC SCALE



(IN FEET)
 1 inch = 50 ft.



NOTE:
 THE PROPOSED PROJECT IS FOR THE INSTALLATION OF A NATURAL GAS PIPELINE. UPON INSTALLATION, THE FLOODPLAIN WILL BE RETURNED TO ITS PRE-CONSTRUCTION CONDITION.

STREAM CROSSING #10
 Project Number: C-18422-0010
 Drawing Scale: 1"=50'
 Date Issued: NOV, 2015
 Issue Number:
 Drawn By: ZDS
 Checked By: MEB
 Project Manager: MEB

MOSA D002 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

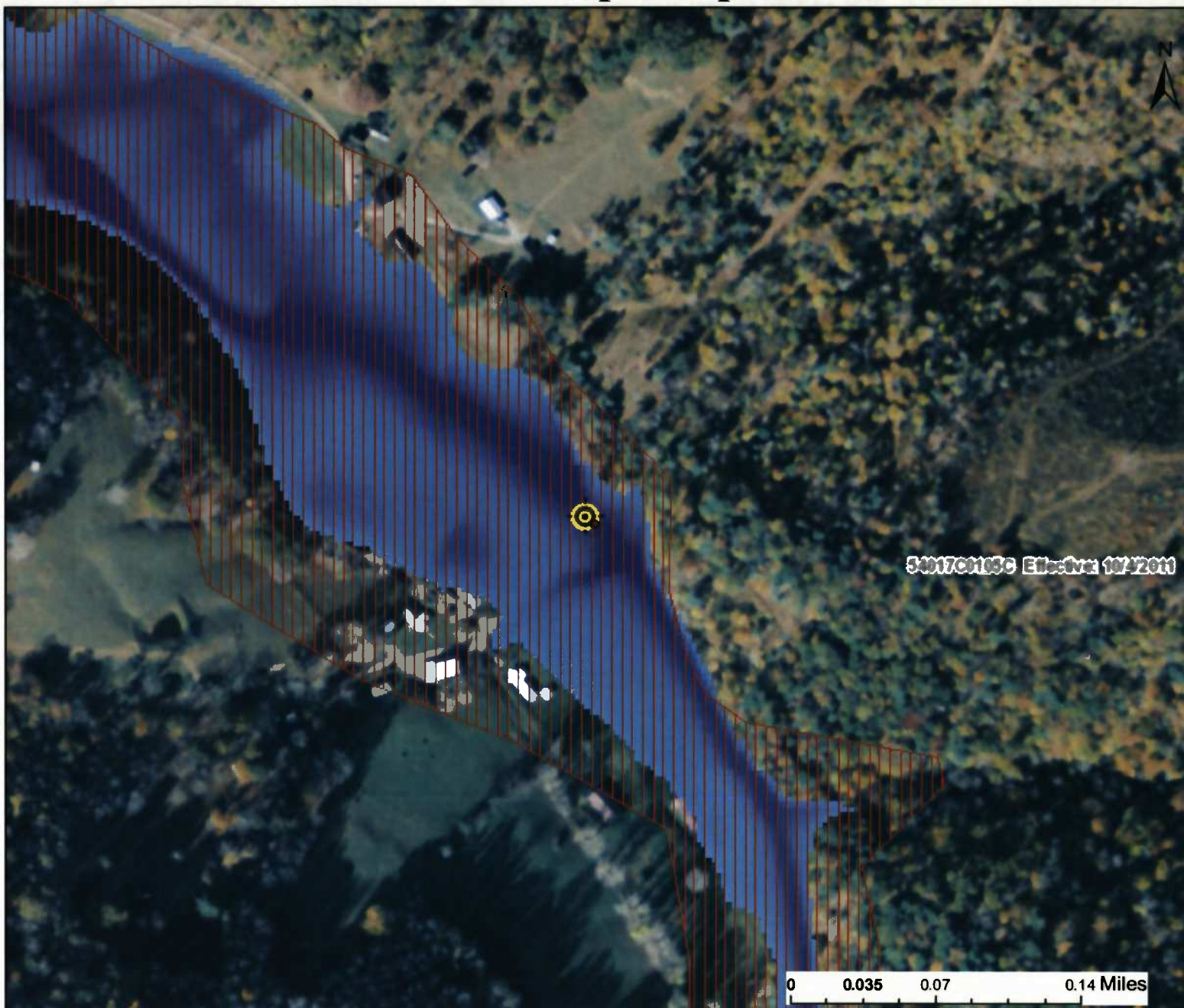
Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-8284

© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map - Impact 3



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p>— Cross Section (XS) Lines</p> <p>— Base Flood Elevation (BFE) Lines</p> <p>▨ Floodway</p> <p>Flood Hazard Zone</p> <p>▨ Approximate Study (Zone A)</p> <p>▨ Detailed Study (AE, AH, AO)</p> <p>■ Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool</i> (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>		<p>⊙ Location of flood information</p> <p>User Notes: Stream Crossing #10</p>	<p>Map created on January 6, 2016</p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A) (Advisory Z)</p> <p>Stream: Arnold Creek</p> <p>FEMA Issued Flood Map: 54017C0105C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: About 752 ft</p> <p>Water Depth: About 12.1 ft (Source: HEC_RAS)</p> <p>Elevation: About 740 ft</p> <p>Location (long, lat): (80.824581 W, 39.323277 N)</p> <p>Location (UTM 17N): (515121, 4352666)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: Arnold Creek</p> <p>Parcel Number:</p>
--	--	--	---

APPENDIX F

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 4

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 4 of 4

Site/Property Information:		
Legal Description: Vacant Lot (Stream Crossing #11)		
Physical Address/911 Address:		
Decimal Latitude/Longitude: 39.323510 N / 80.824410 W		
DMS Latitude/Longitude: 39° 19' 24.50" N / 80° 49' 27.62" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Vacant Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 4 of 4

Property Owner Data:		
Name of Primary Owner (PO): John G. Kelley		
PO Address: 602 James Kelley Lane		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1837		
PO Secondary Phone:		
PO Primary Email: jerrileekelley@gmail.com		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Thomas K. Porter ET UX		
Physical Address: 457 Cedar Lane		
City: West Union	State: WV	Zip: 26456-8946
PO Primary Phone: 304-873-1228		
PO Secondary Phone:		
PO Primary Email: tkporterwv@gmail.com		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Thomas K. Porter ET UX		
Physical Address: 457 Cedar Lane		
City: West Union	State: WV	Zip: 26456-8946
PO Primary Phone: 304-873-1228		
PO Secondary Phone:		
PO Primary Email: tkporterwv@gmail.com		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): John G. Kelley		
Physical Address: 602 James Kelley Lane		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1837		
PO Secondary Phone:		
PO Primary Email: jerrileekelley@gmail.com		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): James Carl Life		
Physical Address: 510 Sam Cavins Road		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1296		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	TURNOUT
	COMPOST FILTER SOCK
	STANDARD SILT FENCE
	REINFORCED SILT FENCE
	SUPER SILT FENCE
	12" COMPOST FILTER SOCK
	TRENCH PLUG
	STONE CONSTRUCTION ENTRANCE
	WATERBAR
	SANDBAG DIVERSION
	SPAN MAT BRIDGE
	LIMITS OF DISTURBANCE
	PROPERTY LINE
	EXISTING STREAM
	HISTORICAL GEOTECHNICAL ISSUES
	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS/PFO WETLANDS
	EXISTING CONTOURS
	FEMA FLOODPLAIN
	DIVERSION BERM
	PROPOSED PIPELINE

NWP-12 PLAN LEGEND

Project Number: G-18422-0010
 Drawing Scale: 11.5
 Date Issued: NOV, 2015
 Index Number:
 Drawn By: ZOR
 Checked By: MEB
 Project Manager: MEB

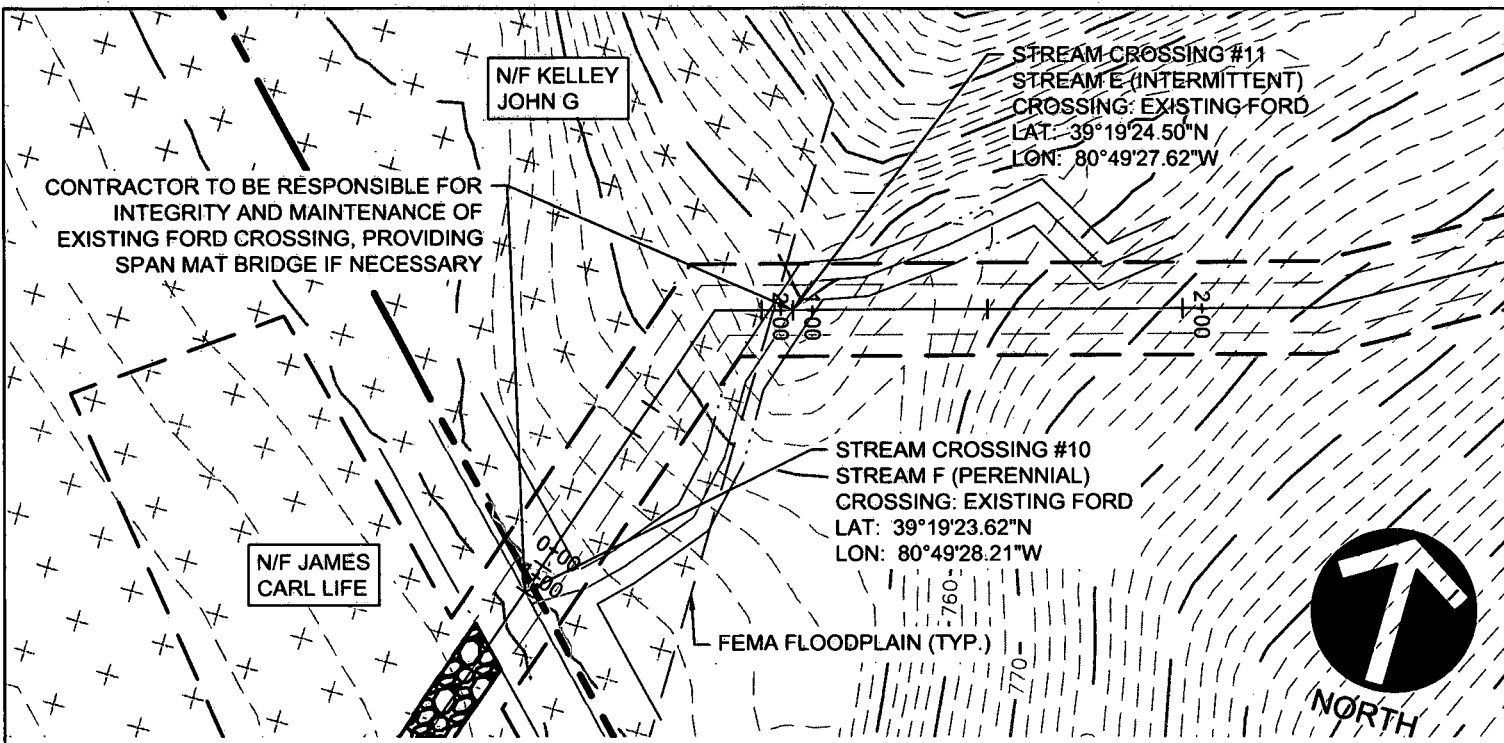
MOSA D002 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	



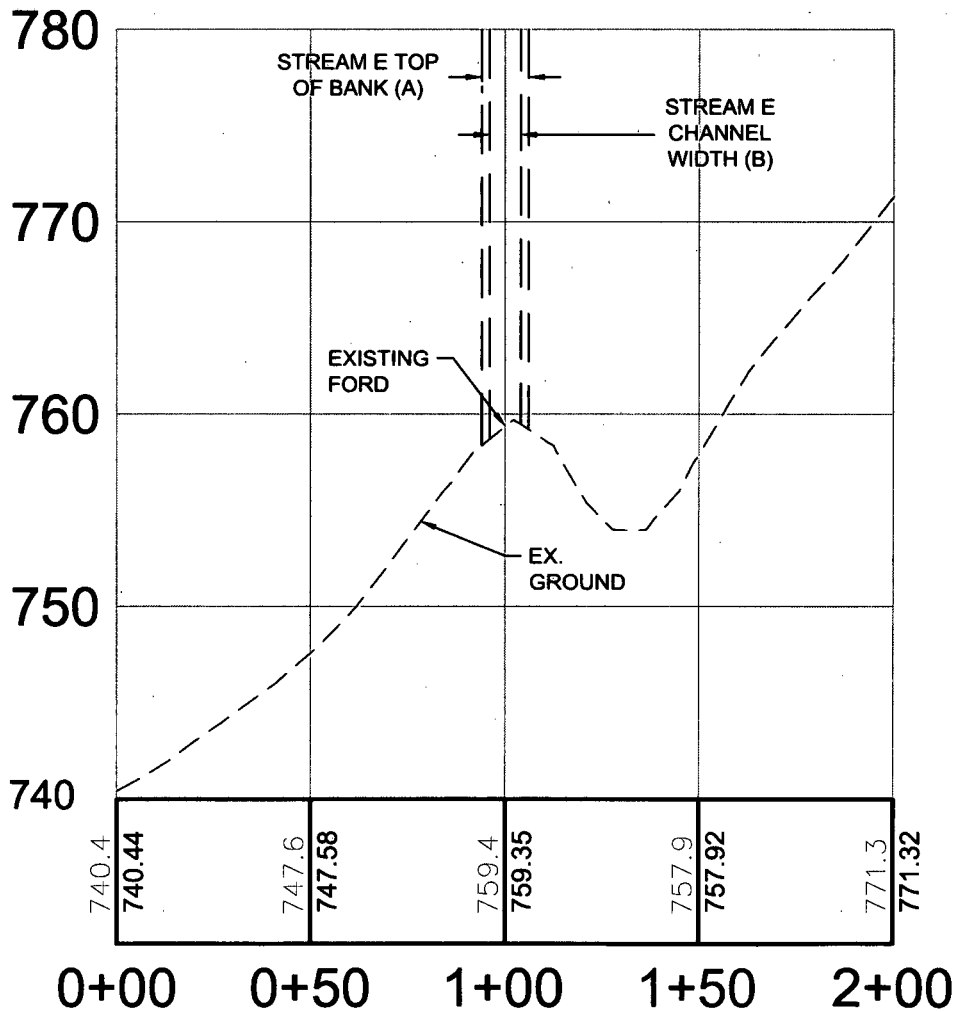
GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



GRAPHIC SCALE



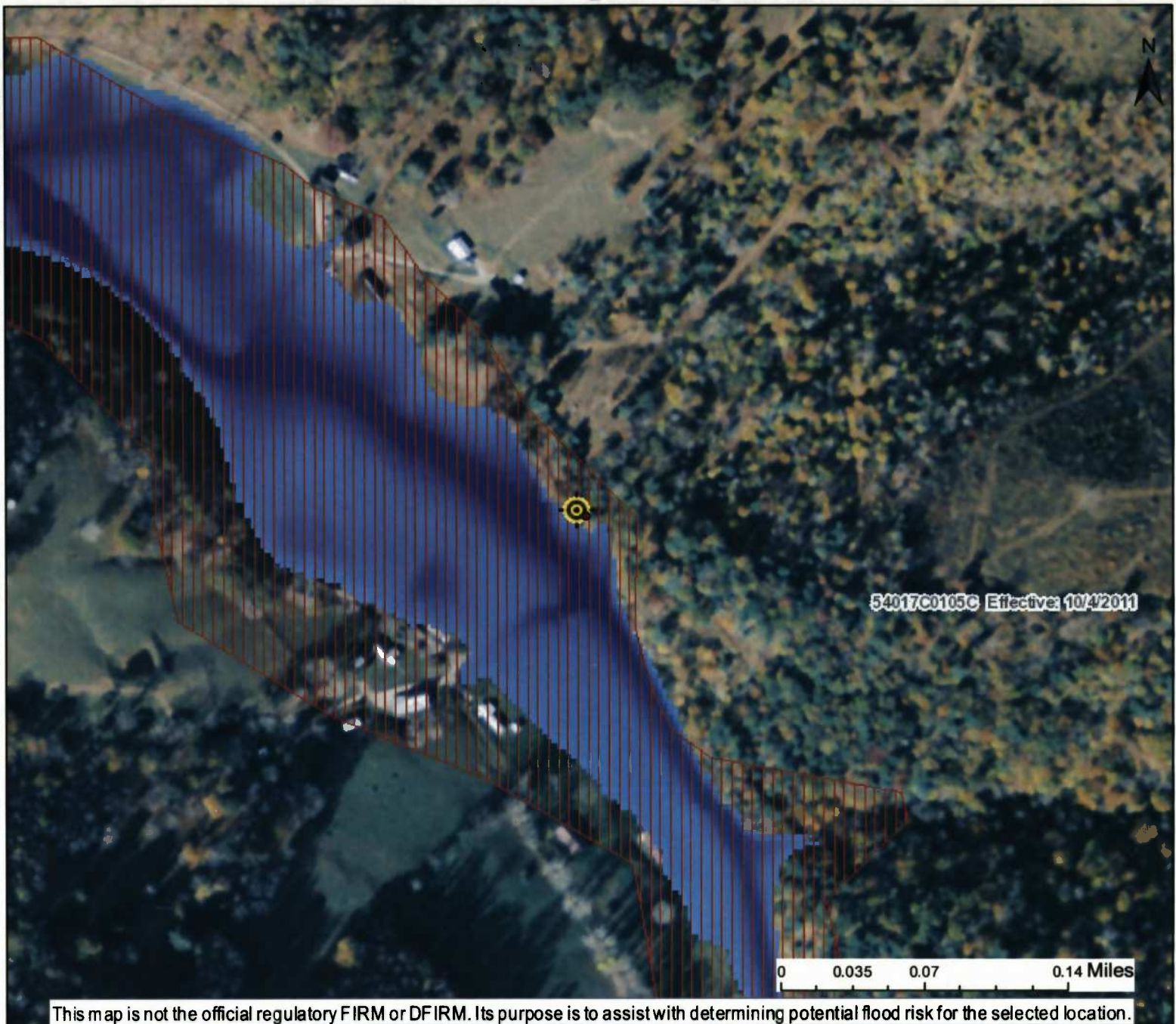
(IN FEET)
1 inch = 50 ft.



NOTE:
THE PROPOSED PROJECT IS FOR THE INSTALLATION OF A NATURAL GAS PIPELINE. UPON INSTALLATION, THE FLOODPLAIN WILL BE RETURNED TO ITS PRE-CONSTRUCTION CONDITION.

STREAM CROSSING #11 Project Number: C-18422-0010 Drawing Scale: 1"=50' Date Issued: NOV. 2015 Index Number: Drawn By: ZDR Checked By: MEB Project Manager: MEB APPENDIX F	MOSA D002 PIPELINE DODDRIDGE COUNTY, WEST VIRGINIA PREPARED FOR: EQM GATHERING OPCO, LLC 825 LIBERTY AVENUE PITTSBURGH, PENNSYLVANIA 15222	<table border="1"> <thead> <tr> <th>Date</th> <th>No</th> <th>REVISION RECORD</th> </tr> </thead> <tbody> <tr><td>-</td><td>01</td><td></td></tr> <tr><td>-</td><td>02</td><td></td></tr> <tr><td>-</td><td>03</td><td></td></tr> <tr><td>-</td><td>04</td><td></td></tr> <tr><td>-</td><td>05</td><td></td></tr> <tr><td>-</td><td>06</td><td></td></tr> <tr><td>-</td><td>07</td><td></td></tr> <tr><td>-</td><td>08</td><td></td></tr> </tbody> </table>	Date	No	REVISION RECORD	-	01		-	02		-	03		-	04		-	05		-	06		-	07		-	08		<p>GATEWAY® The Gateway Engineers, Inc. Full-Service Civil Engineering & Surveying Pittsburgh, PA gatewayengineers.com 855-634-9284</p>
	Date	No	REVISION RECORD																											
-	01																													
-	02																													
-	03																													
-	04																													
-	05																													
-	06																													
-	07																													
-	08																													

WV Flood Map - Impact 4



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p>— Cross Section (XS) Lines</p> <p>— Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool</i> (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #11</p>	<p style="text-align: right;"><i>Map created on January 6, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A</p> <p>Stream: Arnold Creek</p> <p>FEMA Issued Flood Map: 54017C0105C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 756 ft</p> <p>Location (long, lat): (80.824410 W, 39.323510 N)</p> <p>Location (UTM 17N): (515136, 4352692)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: Arnold Creek</p> <p>Parcel Number:</p>
--	--	---	--

APPENDIX G
UNREGULATED FLOODPLAIN IMPACT SITE MAPS

LEGEND

	TURNOUT
	COMPOST FILTER SOCK
	STANDARD SILT FENCE
	REINFORCED SILT FENCE
	SUPER SILT FENCE
	12" COMPOST FILTER SOCK
	TRENCH PLUG
	STONE CONSTRUCTION ENTRANCE
	WATERBAR
	SANDBAG DIVERSION
	SPAN MAT BRIDGE
	LIMITS OF DISTURBANCE
	PROPERTY LINE
	EXISTING STREAM
	HISTORICAL GEOTECHNICAL ISSUES
	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS/PFO WETLANDS
	EXISTING CONTOURS
	FEMA FLOODPLAIN
	DIVERSION BERM
	PROPOSED PIPELINE

NWP-12 PLAN LEGEND

Project Number: C-18422-0010
 Drawing Scale: N.T.S.
 Date Issued: NOV. 2015
 Index Number: -
 Drawn By: ACR
 Checked By: MEB
 Project Manager: MEB

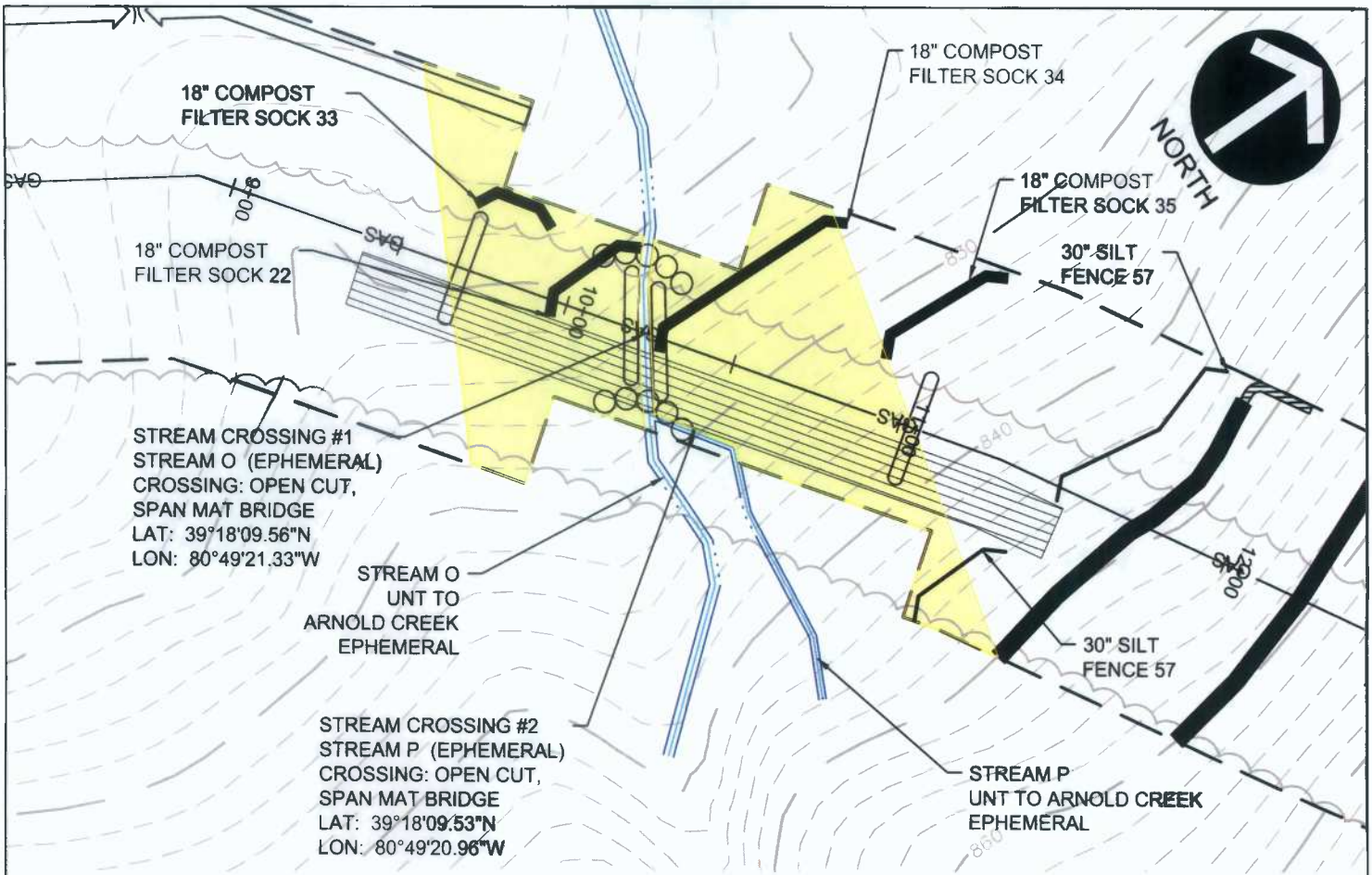
MOSA D002 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

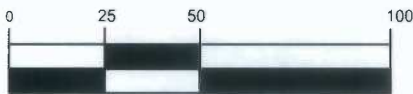
Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



GRAPHIC SCALE



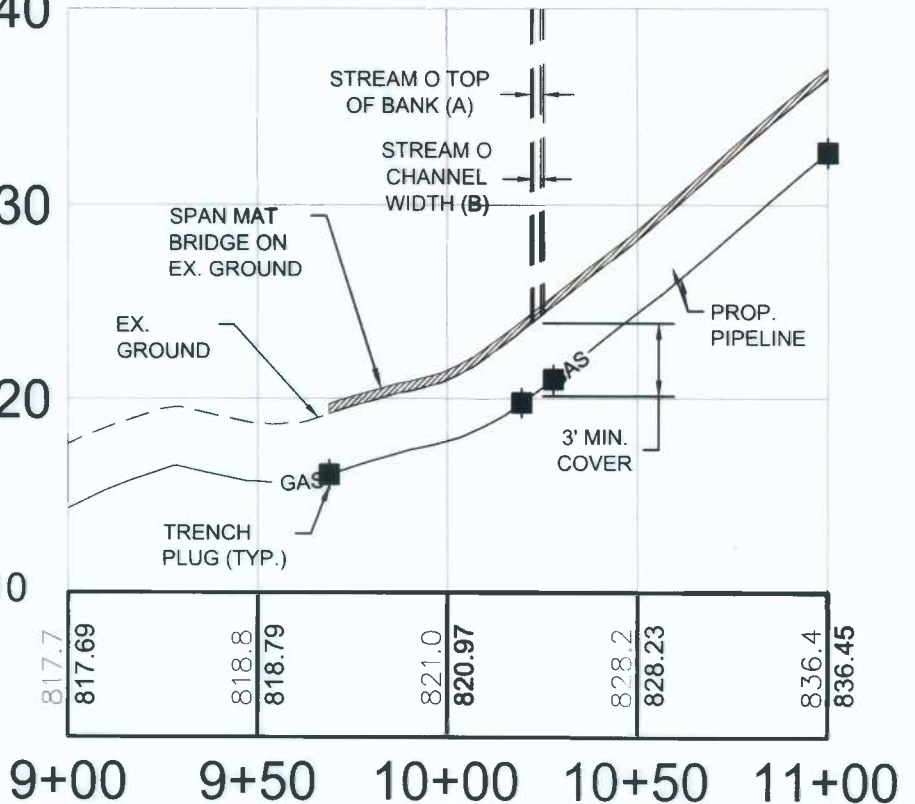
(IN FEET)
 1 inch = 50 ft.

840

830

820

810



STREAM CROSSING #1 & #2

MOSA D002 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: C-18422-0010
 Drawing Scale: 1"=50'
 Date Issued: NOV. 2015
 Index Number: ---
 Drawn By: ZGR
 Checked By: MEB
 Project Manager: MEB

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

APPENDIX G

WV Flood Map - Non-Impact 1



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

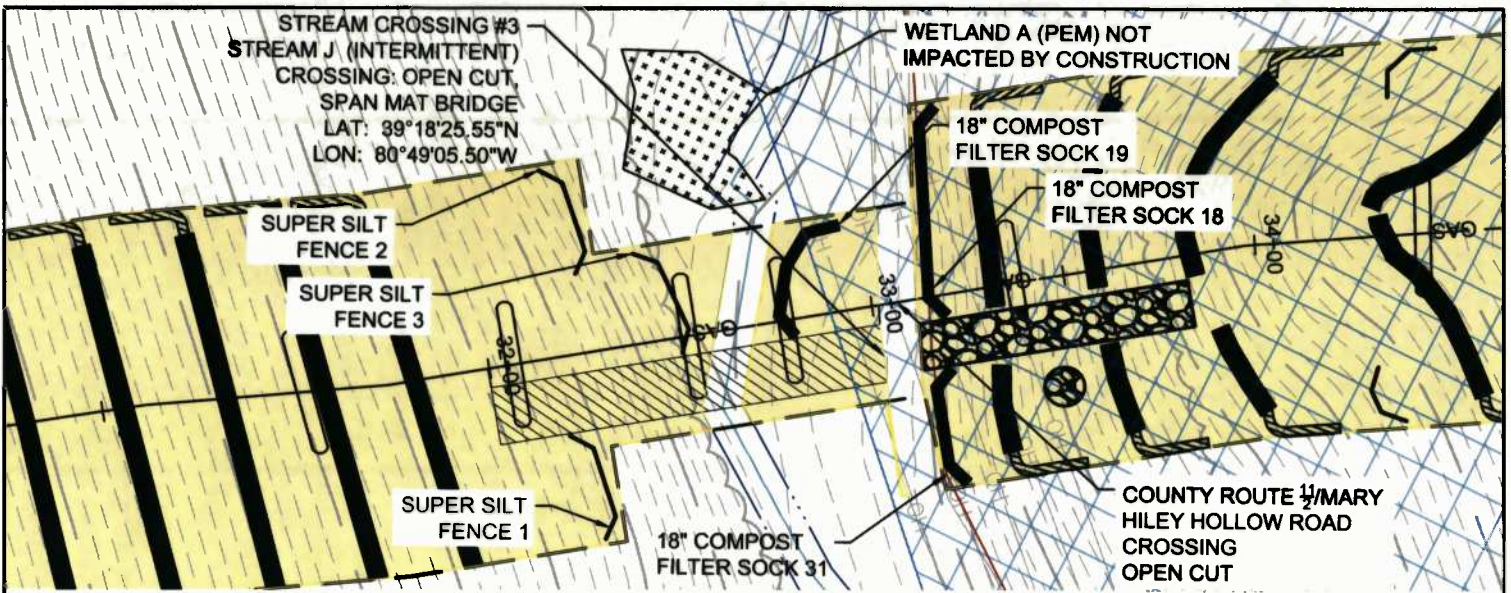
<p>— Cross Section (XS) Lines</p> <p>— Base Flood Elevation (BFE) Lines</p> <p>▨ Floodway</p> <p>Flood Hazard Zone</p> <p>▨ Approximate Study (Zone A)</p> <p>▨ Detailed Study (AE, AH, AO)</p> <p>■ Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p>⊙ Location of flood information</p> <p>User Notes: Stream Crossing #1</p>	<p style="text-align: right;"><i>Map created on January 6, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0115C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 820 ft</p> <p>Location (long, lat): (80.822671 W, 39.302708 N)</p> <p>Location (UTM 17N): (515290, 4350383)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	---	--

WV Flood Map - Non-Impact 2

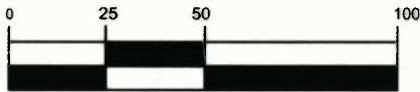


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

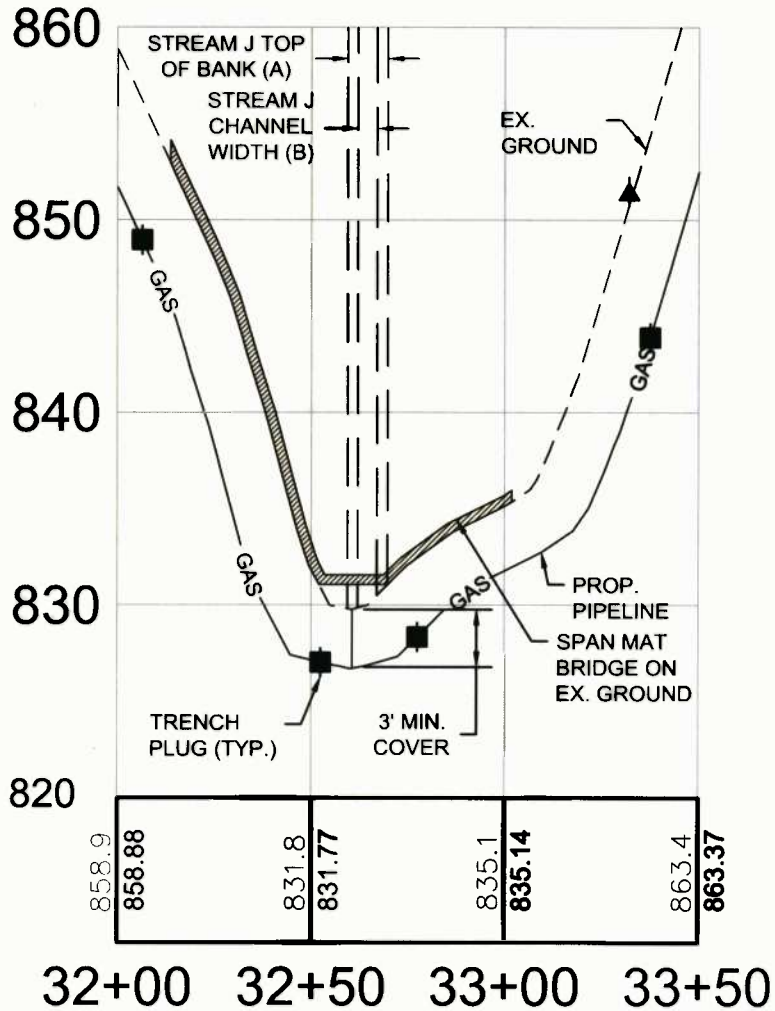
<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool</i> (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #2</p>	<p style="text-align: right;"><i>Map created on January 6, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0115C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 825 ft</p> <p>Location (long, lat): (80.822553 W, 39.302700 N)</p> <p>Location (UTM 17N): (515300, 4350383)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	--	--



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.



STREAM CROSSING #3

MOSA D002 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: C-18422-2010
Drawing Scale: 1"=50'
Date Issued: NOV. 2018
Index Number:
Drawn By: JMB
Checked By: MEB
Project Manager: MEB

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

APPENDIX G

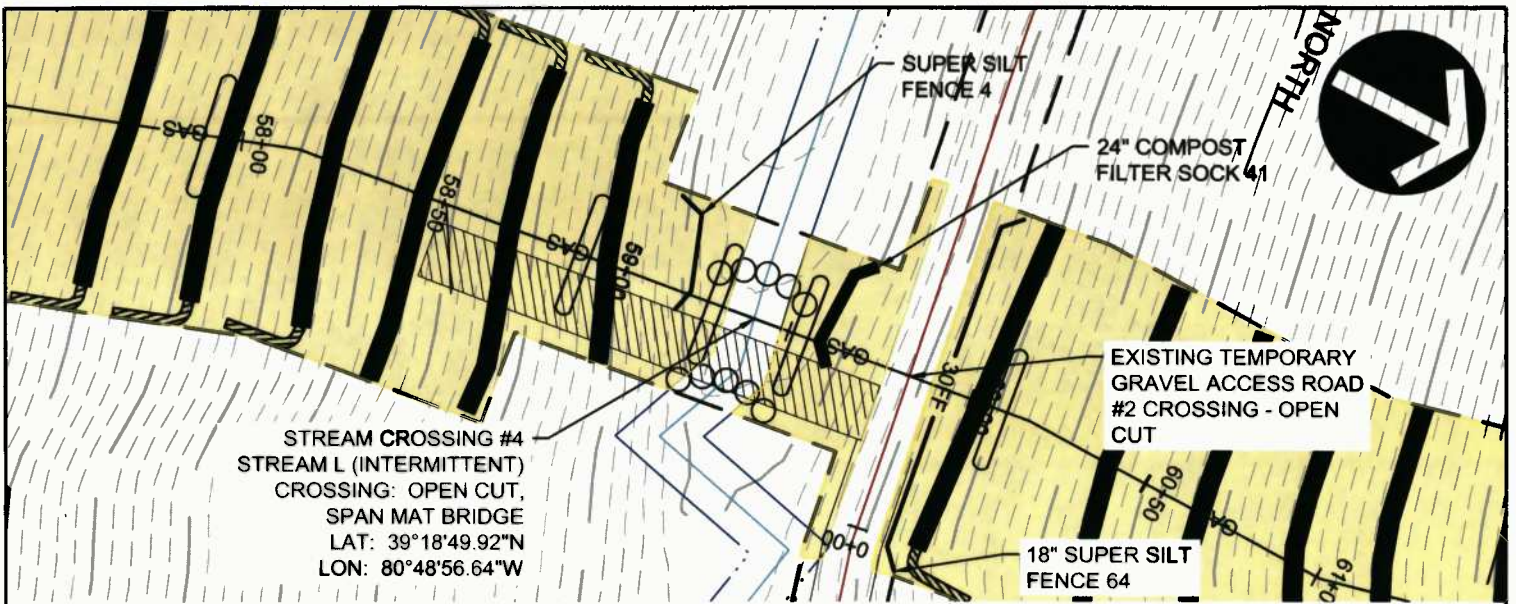
© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map - Non-Impact 3

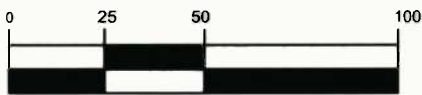


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

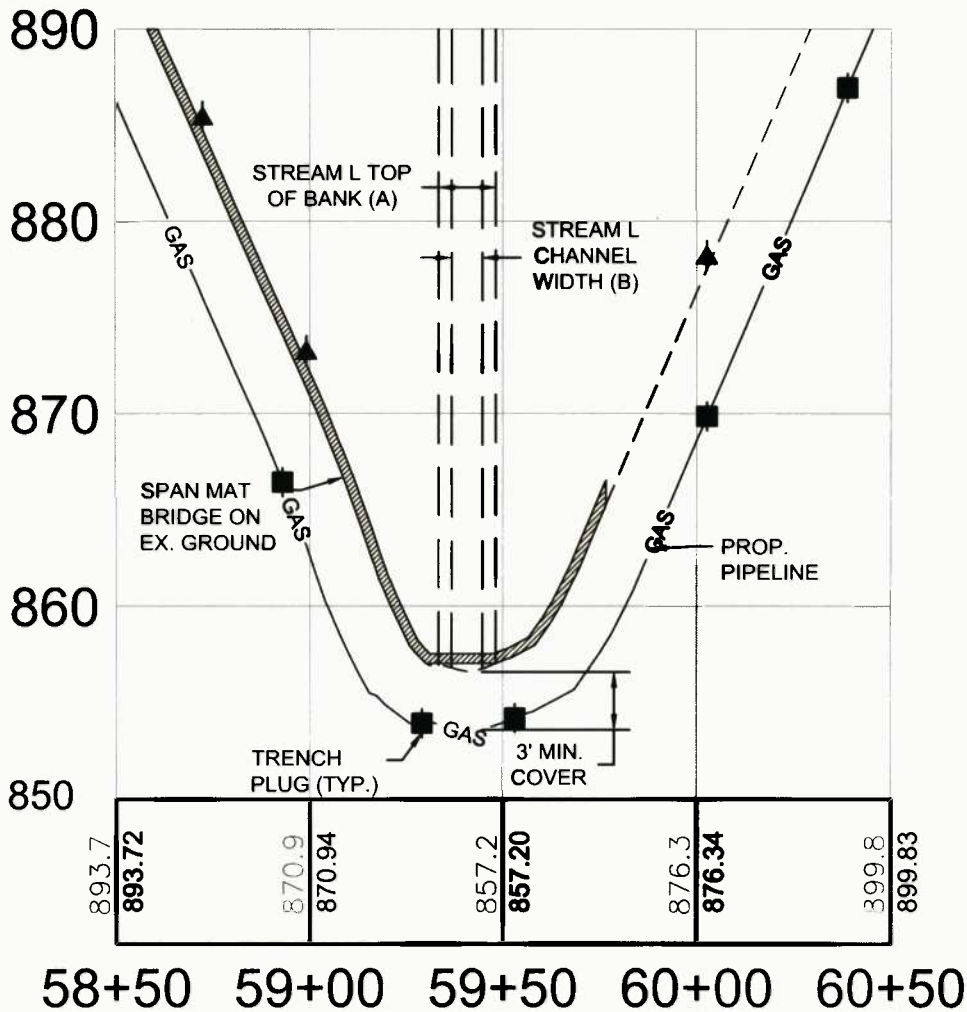
<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #3</p>	<p style="text-align: right;"><i>Map created on January 6, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0115C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 830 ft</p> <p>Location (long, lat): (80.818262 W, 39.307149 N)</p> <p>Location (UTM 17N): (515669, 4350877)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
---	--	--	--



GRAPHIC SCALE



(IN FEET)
 1 inch = 50 ft.



STREAM CROSSING #4

MOSA D002 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: G:18422-0010
 Drawing Scale: 1"=50'
 Date Issued: 10/27/2015
 Index Number:
 Drawn By: ZDR
 Checked By: MEB
 Project Manager: MEB

APPENDIX G

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

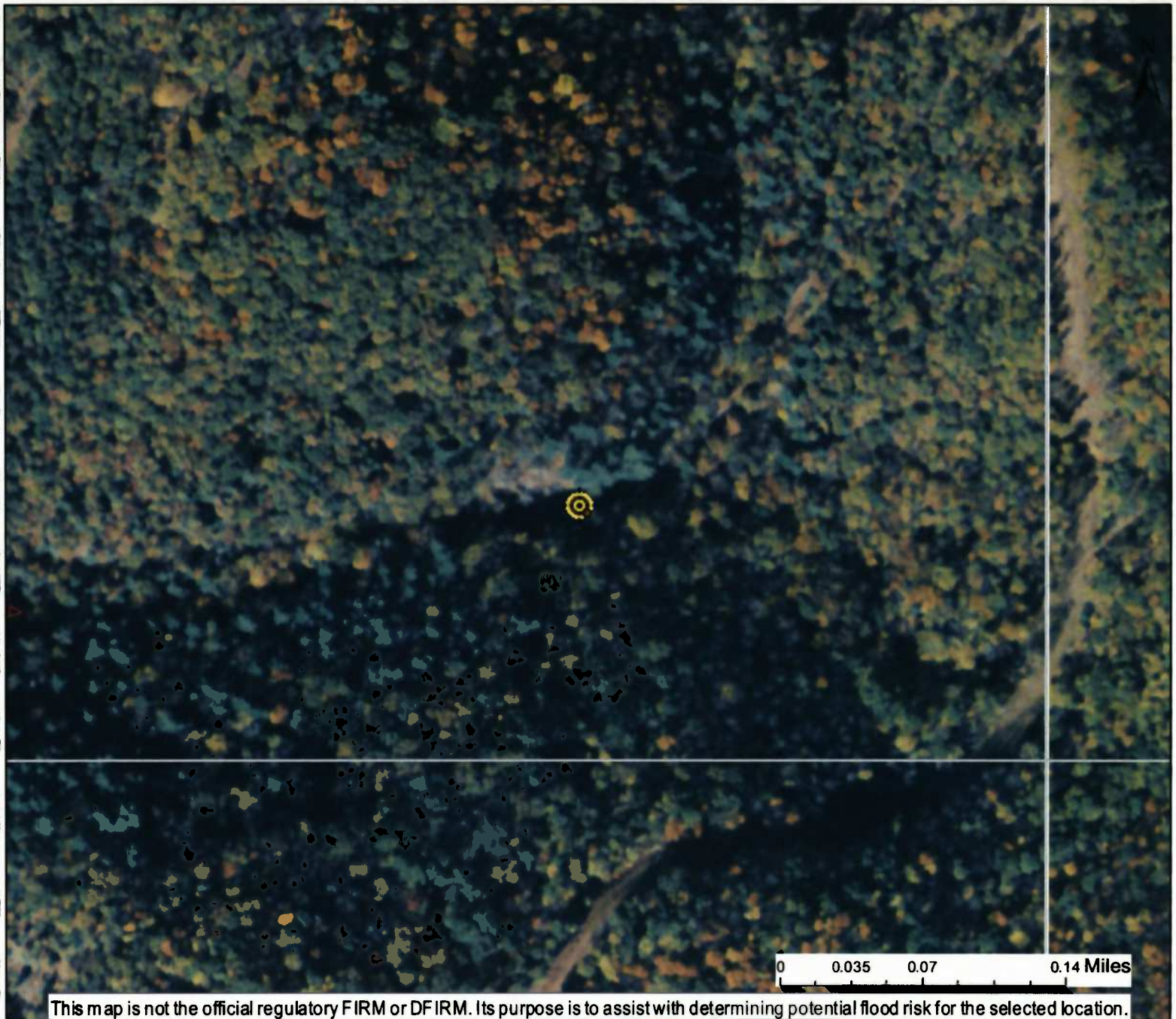
Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

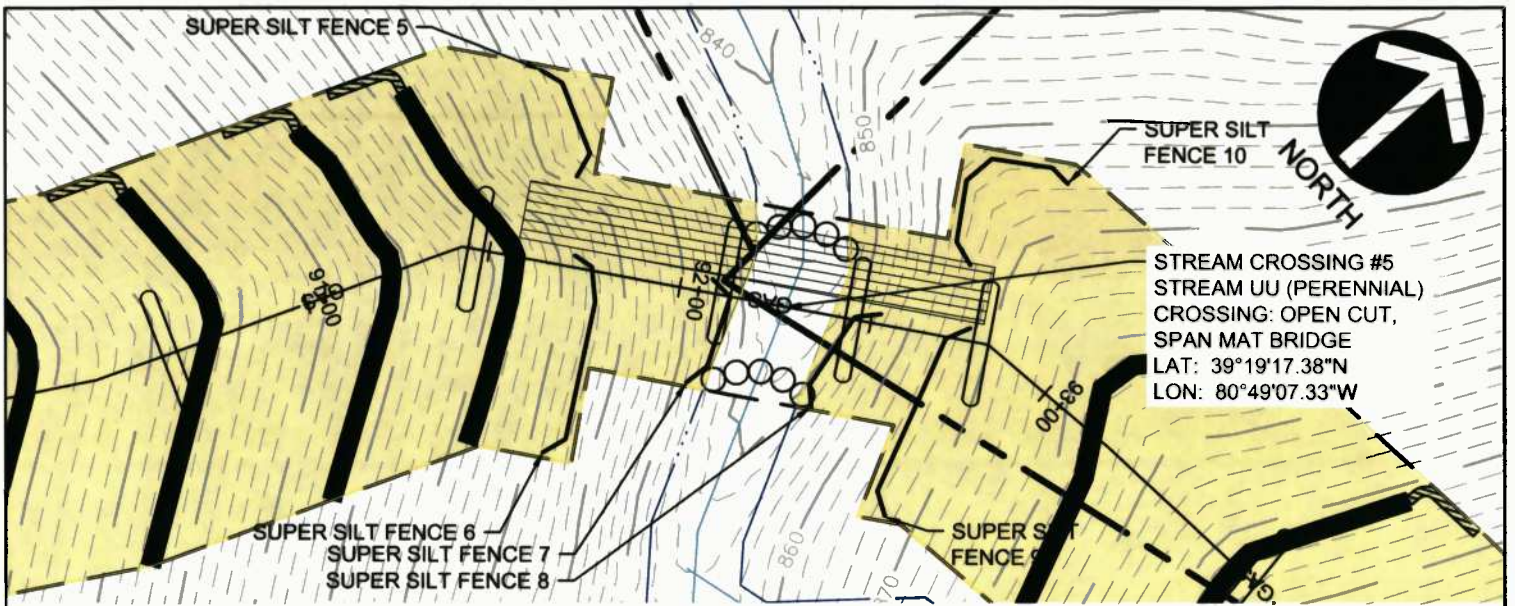
© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map - Non-Impact 4

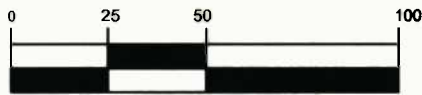


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

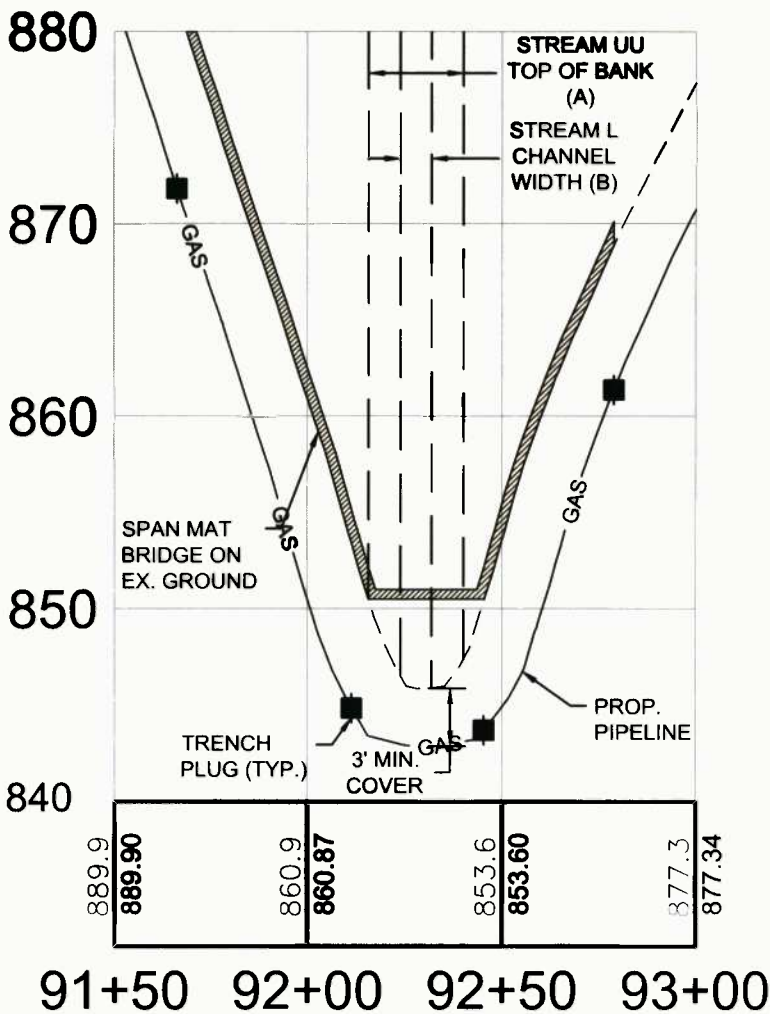
<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #4</p>	<p style="text-align: right;"><i>Map created on January 6, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0105C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 858 ft</p> <p>Location (long, lat): (80.815794 W, 39.313915 N)</p> <p>Location (UTM 17N): (515880, 4351628)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	--	--



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.



STREAM CROSSING #5
Project Number: 2-18422-0010
Drawing Scale: 1"=50'
Date Issued: 06/01/2015
Index Number:
Drawn By: ZOE
Checked By: MEB
Project Manager: MEB

MOSA D002 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 856-634-9284

APPENDIX G

© Gateway Engineers Inc. All Rights Reserved





WV Flood Map - Non-Impact 5

54017C0105C Effective: 10/4/2011




0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

Map created on January 6, 2016

-  Cross Section (XS) Lines
 -  Base Flood Elevation (BFE) Lines
 -  Floodway
 -  Location of flood information
- User Notes:**
Stream Crossing #5

Flood Hazard Zone

-  Approximate Study (Zone A)
-  Detailed Study (AE, AH, AO)
-  Community Rating System Areas

Disclaimer:

The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov.
 WV Flood Tool (<http://www.MapWV.gov/flood>) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.

Flood Hazard Area:

Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard

Flood Hazard Zone: N/A

Stream: N/A

FEMA Issued Flood Map: 54017C0105C

Watershed (HUC8): Little Musringum-Middle Island (503)

Advisory Flood Height: N/A

Water Depth: N/A

Elevation: About 849 ft

Location (long, lat): (80.818778 W, 39.321523 N)

Location (UTM 17N): (515621, 4352472)

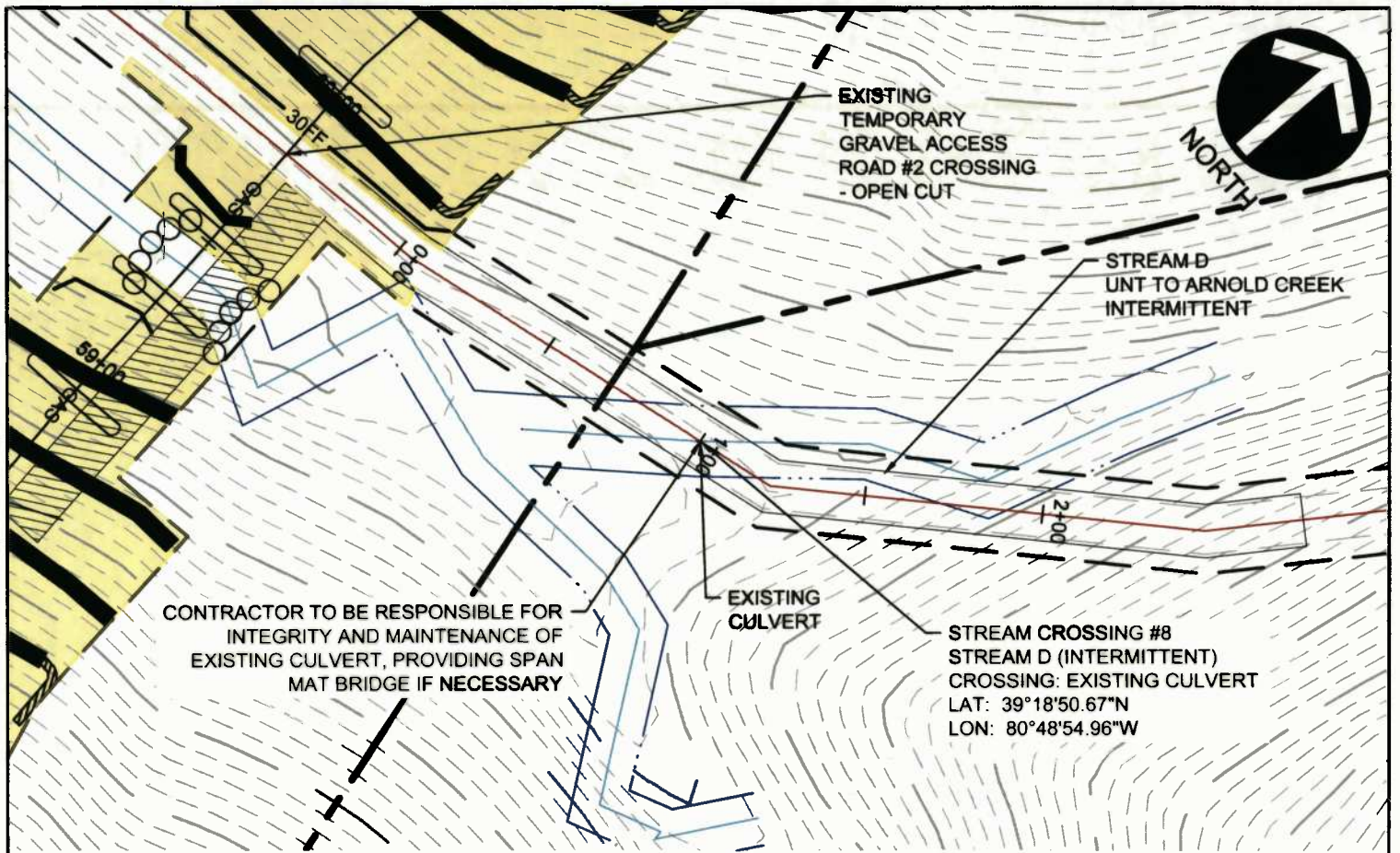
Contacts: Doddridge

CRS Information: N/A

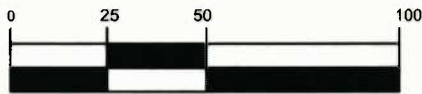
Flood Profile: N/A

HEC-RAS Model: N/A

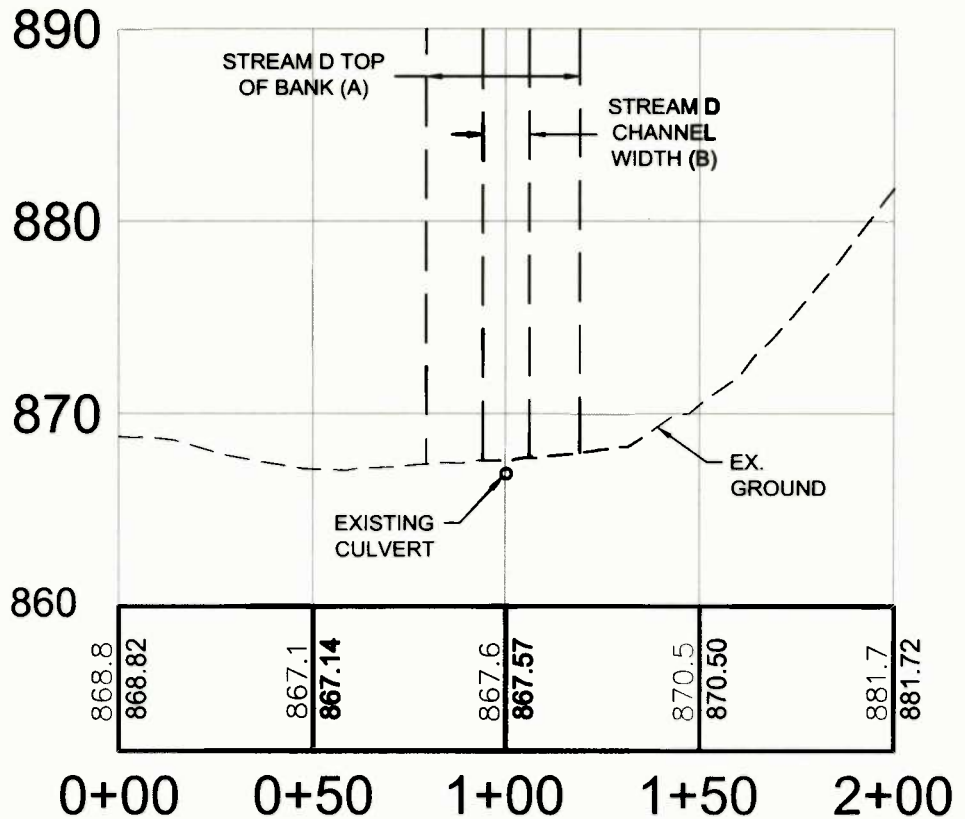
Parcel Number:



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.



STREAM CROSSING #8

MOSA D002 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: G-19422-0010
Drawing Scale: 1"=50'
Date Issued: 2/07/2015
Index Number:
Drawn By: JDR
Checked By: JEB
Project Manager: JEB

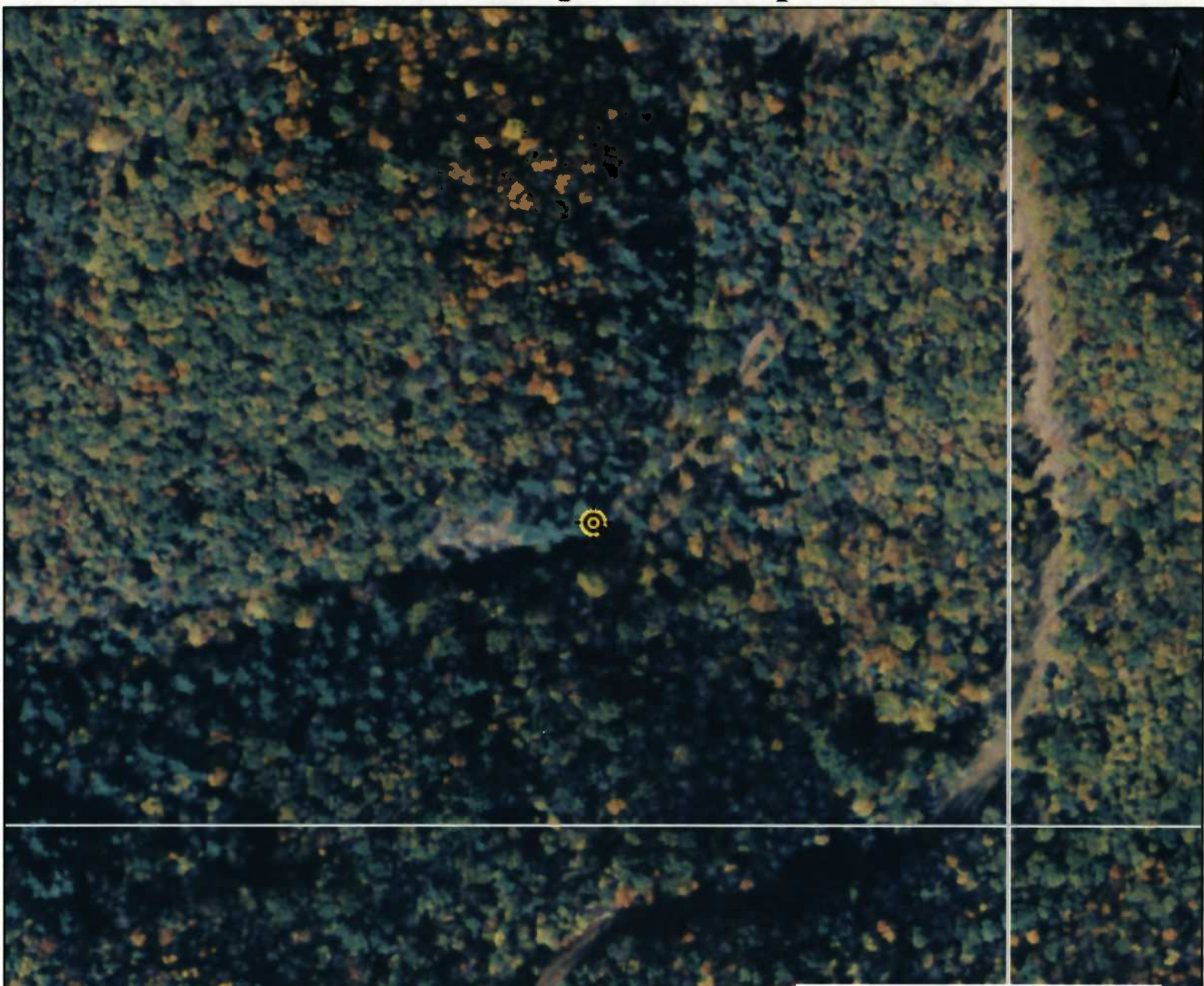
PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

APPENDIX G

WV Flood Map - Non-Impact 6



0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

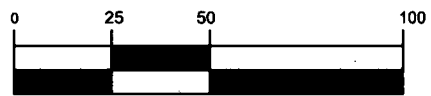
<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #8</p>	<p style="text-align: right;"><i>Map created on January 6, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0105C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 874 ft</p> <p>Location (long, lat): (80.815345 W, 39.314128 N)</p> <p>Location (UTM 17N): (515919, 4351652)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	--	--



NORTH

STREAM CROSSING #9
STREAM H (EPHEMERAL)
CROSSING: SPAN MAT
LAT: 39°18'51.56"N
LON: 80°49'03.73"W

GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

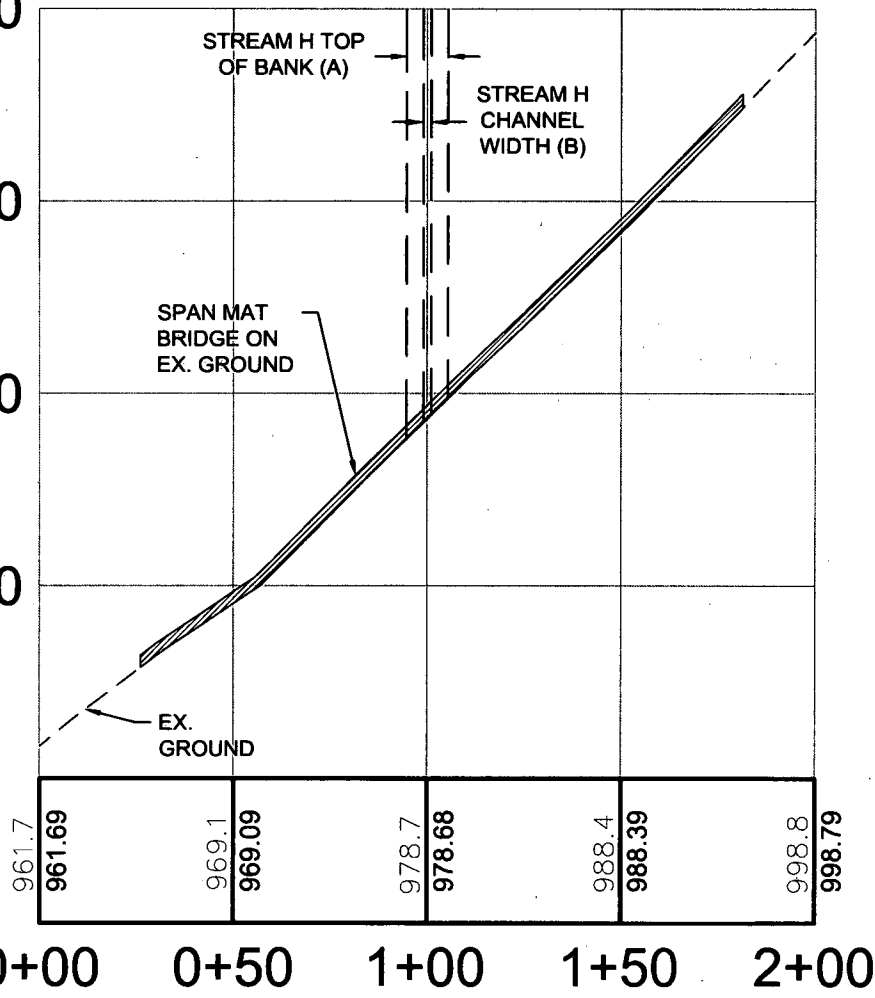
1000

990

980

970

960



STREAM CROSSING #9

MOSA D002 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: NOV. 2018
Index Number:
Drawn By: JDR
Checked By: JEA
Project Manager: JEB

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

APPENDIX G

© Gateway Engineers Inc. All Rights Reserved

WV Flood Map - Non-Impact 7



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool</i> (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #9</p>	<p style="text-align: right;"><i>Map created on January 6, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0105C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 984 ft</p> <p>Location (long, lat): (80.817780 W, 39.314360 N)</p> <p>Location (UTM 17N): (515709, 4351677)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	--	--

APPENDIX H
STREAM IMPACT TABLES

Table 1

Impacted Streams within the Project Area (Regulated Floodplain)

Description	Designation ¹	Waterbody	Stream Type	Stream Classification ²	Approx. Station	Crossing Location	County	Nearest Intersection	Crossing Method	Top of Bank Width (feet)	Crossing Length (feet)	Fill Material (cu. ft)	Crossing Area (sq. ft)	Stream Dimensions ³			
														Channel Width (feet)	Channel Depth (feet)	Water Width (feet)	Water Depth (inches)
Crossing #6	Stream C	Middle Island Creek	Perennial	WWF	118+51	Lat 39°19'22.26" Lon -80°48'39.44"	Doddridge	SR 18 & CR 28	Conventional Bore	100	N/A	N/A	N/A	45-55	2-8	35-40	2-10
Crossing #7	Stream G	UNT to Arnold Creek	Intermittent	N/A	AR-2	Lat 39°18'47.87" Lon -80°49'16.12"	Doddridge	CR 11/2 & Arnolds Creek Road	Existing Culvert/ Span Mat	10-15	27	250	405	6-8	1-5	Dry	Dry
Crossing #10	Stream F	Arnold Creek	Perennial	WWF	AR-4	Lat 39°19'23.62" Lon -80°49'28.21"	Doddridge	Arnolds Creek Road & Little Creek Run	Existing Ford/ Span Mat	30	28	500	840	20	2	20	3-6
Crossing #11	Stream E	UNT to Arnold Creek	Intermittent	N/A	AR-4	Lat 39°19'24.50" Lon -80°49'27.62"	Doddridge	Arnolds Creek Road & Little Creek Run	Existing Ford/ Span Mat	5-10	47	167	470	4-8	1-3	1	<1
Total USACE Impacts											102	917	1,715 (0.04 ac)				

Notes:

1. This preliminary determination of jurisdictional status is based on the Corps/EPA JDI Guidebook instruction.
2. WWF – Warm Water Fishery, as classified by WV Requirements Governing Water Quality Standards Rule – Title 47CRS2.
3. All dimensions in the table are approximate.

Table 1

Impacted Streams within the Project Area (Unregulated Floodplain)

Description	Designation ¹	Waterbody	Stream Type	Stream Classification ²	Approx. Station	Crossing Location	County	Nearest Intersection	Crossing Method	Top of Bank Width (feet)	Crossing Length (feet)	Fill Material (cu. ft)	Crossing Area (sq. ft)	Stream Dimensions ³			
														Channel Width (feet)	Channel Depth (feet)	Water Width (feet)	Water Depth (inches)
Crossing #1	Stream O	UNT to Arnold Creek	Ephemeral	N/A	10+23	Lat 39°18'09.56" Lon -80°49'21.33"	Doddridge	CR 11/2 & Arnolds Creek Road	Open Cut/Span Mat	2-3	54	50	162	1-2	1-3	Dry	Dry
Crossing #2	Stream P	UNT to Arnold Creek	Ephemeral	N/A	10+23	Lat 39°18'09.53" Lon -80°49'20.96"	Doddridge	CR 11/2 & Arnolds Creek Road	Open Cut/Span Mat	2	30	33	60	1	1.5	Dry	Dry
Crossing #3	Stream J	Rock Run	Intermittent	N/A	32+65	Lat 39°18'25.55" Lon -80°49'05.50"	Doddridge	CR 11/2 & Arnolds Creek Road	Open Cut/Span Mat	5-10	53	167	530	3-5	0.5-2.5	Dry	Dry
Crossing #4	Stream L	UNT to Arnold Creek	Intermittent	N/A	59+40	Lat 39°18'49.92" Lon -80°48'56.64"	Doddridge	CR 11/2 & Arnolds Creek Road	Open Cut/Span Mat	10-15	52	250	780	5-8	3	Dry	Dry
Crossing #5	Stream UU	UNT to Arnold Creek	Perennial	N/A	92+28	Lat 39°19'17.38" Lon -80°49'07.33"	Doddridge	Arnolds Creek Road & Little Creek Run	Open Cut/Span Mat	6-12	51	200	612	5-8	1-3	2-3	1-3
Crossing #8	Stream D	UNT to Arnold Creek	Intermittent	N/A	AR-2	Lat 39°18'50.67" Lon -80°48'54.96"	Doddridge	CR 11/2 & Arnolds Creek Road	Existing Culvert/ Span Mat	12-20	48	333	960	6-12	3-6	Dry	Dry
Crossing #9	Stream H	UNT to Arnold Creek	Ephemeral	N/A	AR-3	Lat 39°18'51.56" Lon -80°49'03.73"	Doddridge	CR 11/2 & Arnolds Creek Road	Span Mat	2-4	24	67	96	1-2	2-4	Dry	Dry
Total USACE Impacts											312	1,100	3,200 (0.07 ac)				

Notes:

1. This preliminary determination of jurisdictional status is based on the Corps/EPA JDI Guidebook Instruction.
2. WWF – Warm Water Fishery, as classified by WV Requirements Governing Water Quality Standards Rule – Title 47CRS2.
3. All dimensions in the table are approximate.



GATEWAY

On Call. On Time. On Target.

#16-412-B
EQM Gathering
OpCo, LLC
(MOSA D003)
MOSA-S036

C-18422-0010

January 2016

MOSA D003 and MOSA S036 Pipelines

Doddridge County, West Virginia

PREPARED FOR

EQM Gathering OpCo, LLC.
625 Liberty Avenue
Suite 1700
Pittsburgh, PA 15222

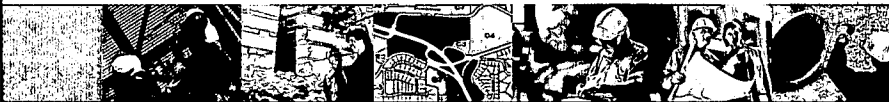
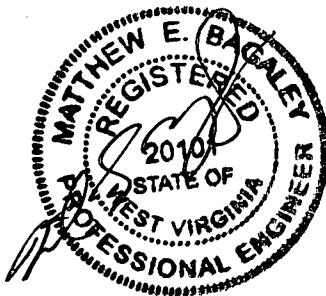
SUBMITTED BY

The Gateway Engineers, Inc.
400 Holiday Drive,
Suite 300
Pittsburgh, PA 15220
412.921.4030 PHONE
412.921.9960 FAX

www.gatewayengineers.com

REVIEWED BY

Matthew E. Bagaley, P.E.



A FULL-SERVICE CIVIL ENGINEERING FIRM

Doddridge County WV Floodplain Development Permit Application

TABLE OF CONTENTS

	<u>Page No.</u>
Floodplain Development Permit Application	Appendix A
USGS Site Location Map	Appendix B
Development Site/Property Information – Impact 1	Appendix C
Development Site/Property Information – Impact 2	Appendix D
Development Site/Property Information – Impact 3	Appendix E
Development Site/Property Information – Impact 4	Appendix F
Development Site/Property Information – Impact 5	Appendix G
Development Site/Property Information – Impact 6	Appendix H
Development Site/Property Information – Impact 7	Appendix I
Development Site/Property Information – Impact 8	Appendix J
Development Site/Property Information – Impact 9	Appendix K
Development Site/Property Information – Impact 10	Appendix L
Development Site/Property Information – Impact 11	Appendix M
Unregulated Floodplain Impact Site Maps	Appendix N
Stream Impact Tables	Appendix O

APPENDIX A
FLOODPLAIN DEVELOPMENT PERMIT APPLICATION



Permit# _____

Project Name:
MOSA D003 & MOSA S036 Pipeline

Permittees Name: _____

Doddridge County, WV

Floodplain Development Permit Application

This document is to be used for projects that impact/potentially impact the FEMA---designated floodplain and/or floodway of Doddridge County, WV pursuant to the rules and regulations established by all applicable Federal, State and local laws and ordinances, including the Doddridge County Floodplain Ordinance.

SECTION 1: GENERAL PROVISIONS (APPLICANT TO READ AND SIGN)

1. No work may start until a permit is issued.
2. The permit may be revoked if any false statements are made herein.
3. If revoked, all work must cease until permit is re-issued.
4. Development shall not be used or occupied until a Certificate of Compliance is issued.
5. The permit will expire if no work is commenced within six months of issuance.
6. Applicant is hereby informed that other permits may be required to fulfill local, state, and federal requirements.
7. Applicant hereby gives consent to the Floodplain Administrator/Manager or his/her representative to make inspections to verify compliance.
8. I THE APPLICANT CERTIFY THAT ALL STATEMENTS HEREIN AND IN ATTACHMENTS TO THIS APPLICATION ARE, TO THE BEST OF MY KNOWLEDGE, TRUE AND ACCURATE.

APPLICANT'S SIGNATURE _____

[Handwritten Signature] (AGENT)

DATE _____

1/15/16

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Applicant Information:

Please provide all pertinent data.

Applicant Information		
Responsible Company Name: EQM Gathering OpCo, LLC		
Corporate Mailing Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
Corporate Point of Contact (POC): Matt Hoover		
Corporate POC Title: Sr. Environmental Coordinator		
Corporate POC Primary Phone: (724) 873-3009		
Corporate POC Primary Email: mhoover@eqt.com		
Corporate FEIN: 37-1661577	Corporate DUNS:	
Corporate Website: www.eqt.com		
Local Mailing Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 1522
Local Project Manager (PM): Matthew E. Bagaley, P.E.		
Local PM Primary Phone: (412) 921-4030		
Local PM Secondary Phone:		
Local PM Primary Email: mbagaley@gatewayengineers.com		
Person Filing Application: Matt Hoover		
Applicant Title: Sr. Environmental Coordinator		
Applicant Primary Phone: (724)873-3009		
Applicant Secondary Phone:		
Applicant Primary Email: mhoover@eqt.com		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Project Narrative:

Describe in detail the proposed development including project name/title, type of development, estimated start and completion timeline, and its potential impact on the floodplain. Use additional copies of this page as needed.

Project Narrative:

The project proponent, EQM Gathering OpCo, LLC. is proposing to install approximately 4.1 miles of 16-inch diameter steel pipeline for the MOSA D003 pipeline and approximately 1.3 miles of 20-inch diameter steel pipeline for the MOSA S036 pipeline. Approximately 3.8 miles of existing gravel access roads will be improved to provide site access. The project includes twenty-seven stream crossings and one wetland crossing using open cut, boring, and horizontal directional drilling (HDD) methods. Of the twenty-seven stream crossings, eleven of them are impacting regulated floodplains. The limits of disturbance will encompass approximately 90.4 acres. The HDD drilling will take place underneath U.S. Route 50, so this area will not be included in the limit of disturbance area but will be in the permit area. The project will begin February 2016 and end September 2016. Construction cost for these crossings estimated at \$850,000 equating to a permit fee of \$4,250.

Impact #1: (Referenced as Crossing #2 – Stream EE in Appendix B & C) – Crossing is proposed as a open cut with a span mat of Left Arnold Creek, a perennial stream.

Impact #2: (Referenced as Crossing #7 – Stream S in Appendix B & D) – Crossing is proposed as a open cut with a span mat of Arnold Creek, a perennial stream.

Impact #3: (Referenced as Crossing #8 – Stream R in Appendix B & E) – Crossing is proposed as a open cut with a span mat of UNT to Arnold Creek, an intermittent stream.

Impact #4: (Referenced as Crossing #9 – Stream Q in Appendix B & F) – Crossing is proposed as a open cut with a span mat of Arnold Creek, a Perennial stream.

Impact #5: (Referenced as Crossing #10 – Stream M in Appendix B & G) – Crossing is proposed as a open cut with a span mat of Arnold Creek, a perennial stream.

Impact #6: (Referenced as Crossing #11 – Stream M in Appendix B & H) – Crossing is proposed as a open cut with a span mat of Arnold Creek, a perennial stream.

Impact #7: (Referenced as Crossing #14 – Stream BB in Appendix B & I) – Crossing is an existing culvert with a span mat, if necessary of UNT to Right Arnold Creek, an intermittent stream.

Impact #8: (Referenced as Crossing #21 – Stream Q in Appendix B & J) – Crossing is an existing ford crossing with a span mat, if necessary, of Arnold Creek, a perennial stream.

Impact #9: (Referenced as Crossing #22 – Stream Q in Appendix B & K) – Crossing is an existing ford crossing with a span mat, if necessary, of Arnold Creek, a perennial stream.

Impact #10: (Referenced as Crossing #23 – Stream HH in Appendix B & L) – Crossing is an existing ford crossing with a span mat, if necessary, of UNT to Arnold Creek, an ephemeral stream.

Impact #11: (Referenced as Crossing #12 – Stream D in Appendix B & M) – Crossing is proposed as a open cut with a span mat of Left Fork Arnold Creek, a perennial stream.

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Proposed Development:

Please check all elements of the proposed project that apply.

DESCRIPTION OF WORK (CHECK ALL APPLICABLE BOXES)

A. STRUCTURAL DEVELOPMENT

<u>ACTIVITY</u>	<u>STRUCTURAL TYPE</u>
<input type="checkbox"/> New Structure	<input type="checkbox"/> Residential (1 – 4 Family)
<input type="checkbox"/> Addition	<input type="checkbox"/> Residential (more than 4 Family)
<input type="checkbox"/> Alteration	<input type="checkbox"/> Non-residential (floodproofing)
<input type="checkbox"/> Relocation	<input type="checkbox"/> Combined Use (res. & com.)
<input type="checkbox"/> Demolition	<input type="checkbox"/> Replacement
<input type="checkbox"/> Manufactured/Mobil Home	

B. OTHER DEVELOPMENT ACTIVITIES:

- | | | | |
|---|---------------------------------|-----------------------------------|--|
| <input type="checkbox"/> Fill | <input type="checkbox"/> Mining | <input type="checkbox"/> Drilling | <input checked="" type="checkbox"/> Pipelining |
| <input type="checkbox"/> Grading | | | |
| <input type="checkbox"/> Excavation (except for STRUCTURAL DEVELOPMENT checked above) | | | |
| <input type="checkbox"/> Watercourse Alteration (including dredging and channel modification) | | | |
| <input type="checkbox"/> Drainage Improvements (including culvert work) | | | |
| <input type="checkbox"/> Road, Street, or Bridge Construction | | | |
| <input type="checkbox"/> Subdivision (including new expansion) | | | |
| <input type="checkbox"/> Individual Water or Sewer System | | | |
| <input type="checkbox"/> Other (please specify) | | | |

Construction cost for these crossings estimated at \$850,000 equating to a permit fee of \$4,250

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Contractor Data:

Please provide all pertinent data for contractors and sub---contractors that may be participating in this project. Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: ____ of ____

Contractor/Sub-Contractor (C/SC) Information:		
C/SC Company Name:		
C/SC WV License Number:		
C/SC FEIN:	C/SC DUNS:	
Local C/SC Point of Contact (POC):		
Local C/SC POC Title:		
C/SC Mailing Address:		
City:	State:	Zip-Code:
Local C/SC Office Phone:		
Local C/SC POC Phone:		
Local C/SC POC E-Mail:		

Engineer Firm Information:		
Engineer Firm Name: The Gateway Engineers, Inc.		
Engineer WV License Number: 20101		
Engineer Firm FEIN: 25-1006946	Engineer Firm DUNS: 06-684-3053	
Engineer Firm Primary Point of Contact (POC): Matthew E. Bagaley, P.E.		
Engineer Firm Primary POC Title: Project Manager		
Engineer Firm Mailing Address: 400 Holiday Drive, Suite 300		
City: Pittsburgh	State: PA	Zip-Code: 15220-2727
Engineer Firm Office Phone: (412) 921-4030		
Engineer Firm Primary POC Phone: (412) 921-4030 ext. 153		
Engineer Firm Primary POC E-Mail: mbagaley@gatewayengineers.com		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Site Plan

A Site Plan is an accurate and detailed map of the proposed development for this project. It shows the size, shape, location and special features of the project property, and the size and location of any development planned to the property, especially as that development will impact the floodplain and/or floodway. Site plans show what currently exists on the project property, and any changes or improvements you are proposing to make. **A certified and licensed engineering firm should complete site plans.**

A SITE PLAN MUST CONTAIN THE FOLLOWING INFORMATION:

1. Legal description of the parcel, north arrow and scale
2. All property lines and their dimensions
3. Names of adjacent roads, location of driveways
4. Location of sloughs, tributaries, streams, rivers, wetlands, ponds, and lakes, with setbacks indicated, and including FEMA floodplain data based on most updated FIRM.
5. Location, size, shape of all buildings, existing and proposed, with elevation of lowest floor indicated.
6. Location and dimensions of existing or proposed on-site sewage systems.
7. Location of all propane tanks, fuel tanks or other liquid storage tanks whether above ground or below ground level.
8. Location and dimensions of any proposed pipeline placement(s) into floodplain/floodway.
9. Location and dimensions of any roadway development into floodplain/floodway. *(Includes initial development access roads)*
10. Location and dimensions of any bridge and/or culvert development into floodplain/floodway.
11. Location and dimensions of any storage yard or facility into the floodplain/floodway.
12. Location of any existing utilities and/or proposed utility placement and/or displacement.
13. Location, dimensions and depth of any existing or proposed fill on site.
14. A survey showing the **existing ground elevations** of at least location on the building site. **ELEVATION NOTE:** All vertical datum will reference either NGVD 29 or NAVD 88. Assumed datum will not be acceptable unless the property is located in an area where vertical datum has not been published. For those areas where vertical datum has not been established, a site plan with contours, elevations using assumed datum, high water marks and existing water levels of sloughs, rivers, lakes or streams and proposed lowest floor elevation.

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Applicant

Please read print name, sign and date below:

- I certify that I am authorized to submit this application for the primary project developer.
- I certify that the information included in this application is to the best of my knowledge true and complete.
- I certify that all required Federal, State, and local permits required by law and/or ordinance for the above described development of this project have been properly attained, are current and valid, and must be presented with this application before a Doddridge County Floodplain Permit may be issued.
- I understand that if in the course of the development project additional permits become required that were not needed during the initial proposal, the primary developer must notify the Doddridge County Floodplain Manager within 48 hours of such need, and that a "Stop Work" order may be issued for all project work directly impacting the floodplain or floodway, until such time the required additional permits are acquired.
- I understand that once the floodplain permit is submitted, the application will be entered into official public record at the next regularly scheduled Doddridge County Commission meeting after the date of submittal.
- I understand that from the date of submittal of the fully completed permit application, the Doddridge County Floodplain Manager has ninety (90) days to make a determination to either grant or deny said permit application. During this approval period, the Doddridge County Floodplain Manager may, at his or her discretion, conduct a review and/or additional study of provided documentation by means of an independent engineering firm. All costs associated with said review and/or study must be reimbursed to the County before issuance of approved permit.
- I understand that during the approval period, the Doddridge County Floodplain Manager or designee may at his or her discretion conduct site visits and document conditions of proposed development pursuant to the permit application.
- I understand that once the Floodplain Permit is granted, the permit will be entered into official public record at the next scheduled Doddridge County Commission meeting after the date of issuance. Appeals to the permit may be made no later than twenty (20) days after said issuance. If a valid appeal is submitted, as determined by the Doddridge County Floodplain Manager, a "Stop Work" order will be issued for all project development directly involving the floodplain or floodway. A public hearing by the Doddridge County Appeals Board will be scheduled no less than ten (10) days after the next regularly scheduled Doddridge County Commission meeting.
- I understand that all decisions of the Doddridge County Appeals Board shall be final.
- **I understand issuance of a Floodplain Permit authorizes me to proceed with construction as proposed. A Certificate of Compliance is required upon substantial completion of the project.**
- In signing this application, the primary developer hereby grants the Doddridge County Floodplain Manager or designee the right to enter onto the above---described location to inspect the development work proposed, in progress, and/or completed.
- I understand that if I do not follow exactly the site---plan submitted and approved by this permit that a "Stop Work" order may be issued by the Wirt County Floodplain Manager and that I must stop all construction immediately until discrepancies of actual work vs. proposed work is resolved.

Applicant Signature: _____

M. E. Bagaley (AGENT)

Date: _____

1/15/16

Applicant Printed Name: _____

MATTHEW E. BAGALEY

APPENDIX B
USGS SITE LOCATION MAP

WETLAND CROSSING #1
WETLAND B
 (PEM)
 CONVENTIONAL BORE
 LAT: 39°17'47.90"
 LON: -80°49'14.28"

STREAM CROSSING #9
STREAM Q (PERENNIAL)
 (REGULATED FLOODPLAIN)
 OPEN CUT /
 SPAN MAT BRIDGE
 LAT: 39°17'40.06"
 LON: -80°49'12.34"

STREAM CROSSING #7
STREAM S (PERENNIAL)
 (REGULATED FLOODPLAIN)
 OPEN CUT /
 SPAN MAT BRIDGE
 LAT: 39°17'07.10"
 LON: -80°48'45.10"

STREAM CROSSING #5
STREAM Y (PERENNIAL)
 (UNREGULATED FLOODPLAIN)
 HDD
 LAT: 39°16'38.16"
 LON: -80°47'54.77"

STREAM CROSSING #4
STREAM X (PERENNIAL)
 (UNREGULATED FLOODPLAIN)
 HDD
 LAT: 39°16'37.65"
 LON: -80°47'54.81"

STREAM CROSSING #3
STREAM FF (INTERMITTENT, PHEMERAL)
 (UNREGULATED FLOODPLAIN)
 HDD / SPAN MAT BRIDGE
 LAT: 39°16'30.80"
 LON: -80°47'53.59"

STREAM CROSSING #12
STREAM D (PERENNIAL)
 (REGULATED FLOODPLAIN)
 OPEN CUT /
 SPAN MAT BRIDGE
 LAT: 39°15'27.27"
 LON: -80°47'36.25"

STREAM CROSSING #1
STREAM BB (INTERMITTENT)
 (UNREGULATED FLOODPLAIN)
 OPEN CUT /
 SPAN MAT BRIDGE
 LAT: 39°15'37.81"
 LON: -80°48'19.36"

STREAM CROSSING #13
STREAM A (PERENNIAL)
 (UNREGULATED FLOODPLAIN)
 OPEN CUT /
 SPAN MAT BRIDGE
 LAT: 39°15'21.05"
 LON: -80°48'02.26"

STREAM CROSSING #11
STREAM M (PERENNIAL)
 (REGULATED FLOODPLAIN)
 OPEN CUT /
 SPAN MAT BRIDGE
 LAT: 39°17'59.56"
 LON: -80°49'19.56"

STREAM CROSSING #10
STREAM M (PERENNIAL)
 (UNREGULATED FLOODPLAIN)
 OPEN CUT /
 SPAN MAT BRIDGE
 LAT: 39°17'56.47"
 LON: -80°49'15.26"

STREAM CROSSING #8
STREAM R (INTERMITTENT)
 (REGULATED FLOODPLAIN)
 OPEN CUT /
 SPAN MAT BRIDGE
 LAT: 39°17'21.34"
 LON: -80°48'50.83"

STREAM CROSSING #6
STREAM W (PERENNIAL)
 (UNREGULATED FLOODPLAIN)
 OPEN CUT /
 SPAN MAT BRIDGE
 LAT: 39°16'52.03"
 LON: -80°48'13.33"

STREAM CROSSING #2
STREAM EE (PERENNIAL)
 (REGULATED FLOODPLAIN)
 OPEN CUT /
 SPAN MAT BRIDGE
 LAT: 39°16'08.22"
 LON: -80°48'06.87"

PROPOSED 16"
MOSA D003 PIPELINE

PROPOSED 20"
MOSA S036 PIPELINE

IMPACT LOCATION MAP 1

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE, WEST VIRGINIA

Project Number: C-18422-0010
 Drawing Scale: 1"=2000'
 Date Issued: DEC 2015
 Index Number:
 Drawn By: TJS
 Checked By: MEB
 Project Manager: MEB

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY®
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

APPENDIX B

STREAM CROSSING #23
 STREAM HH (EPHEMERAL)
 (REGULATED FLOODPLAIN)
 EX. FORD CROSSING
 LAT: 39°17'41.37"
 LON: -80°49'03.96"

STREAM CROSSING #22
 STREAM Q (PERENNIAL)
 (REGULATED FLOODPLAIN)
 EX. FORD CROSSING
 LAT: 39°17'41.48"
 LON: -80°49'04.12"

PROPOSED 16"
MOSA D003 PIPELINE

STREAM CROSSING #21
 STREAM Q (PERENNIAL)
 (REGULATED FLOODPLAIN)
 EXISTING FORD CROSSING
 LAT: 39°17'24.20"
 LON: -80°48'47.15"

STREAM CROSSING #19
 STREAM Y (PERENNIAL)
 (UNREGULATED FLOODPLAIN)
 EXISTING CULVERT
 LAT: 39°16'41.55"
 LON: -80°47'53.46"

STREAM CROSSING #20
 STREAM II (EPHEMERAL)
 (UNREGULATED FLOODPLAIN)
 EXISTING CULVERT
 LAT: 39°17'02.22"
 LON: -80°48'31.73"

STREAM CROSSING #18
 STREAM KK (INTERMITTENT)
 (UNREGULATED FLOODPLAIN)
 EXISTING CULVERT
 LAT: 39°16'25.91"
 LON: -80°48'09.85"

STREAM CROSSING #15
 STREAM OO (EPHEMERAL)
 (UNREGULATED FLOODPLAIN)
 EXISTING CULVERT
 LAT: 39°16'04.03"
 LON: -80°48'23.97"

STREAM CROSSING #16
 STREAM PP (INTERMITTENT)
 (UNREGULATED FLOODPLAIN)
 EXISTING CULVERT
 LAT: 39°16'03.26"
 LON: -80°48'23.80"

STREAM CROSSING #24
 STREAM H (EPHEMERAL)
 (UNREGULATED FLOODPLAIN)
 EXISTING CULVERT /
 SPAN MAT BRIDGE
 LAT: 39°16'19.82"
 LON: -80°47'07.41"

STREAM CROSSING #17
 STREAM PP (INTERMITTENT)
 (UNREGULATED FLOODPLAIN)
 EXISTING CULVERT
 LAT: 39°16'02.38"
 LON: -80°48'21.96"

PROPOSED 20"
MOSA S036 PIPELINE

STREAM CROSSING #26
 STREAM G (EPHEMERAL)
 (UNREGULATED FLOODPLAIN)
 EXISTING CULVERT /
 SPAN MAT BRIDGE
 LAT: 39°15'41.57"
 LON: -80°47'24.24"

STREAM CROSSING #14
 STREAM BB (INTERMITTENT)
 (REGULATED FLOODPLAIN)
 EXISTING CULVERT /
 SPAN MAT BRIDGE
 LAT: 39°15'41.25"
 LON: -80°48'31.44"

STREAM CROSSING #27
 STREAM AA
 (EPHEMERAL)
 EXISTING CULVERT /
 SPAN MAT BRIDGE
 LAT: 39°15'36.73"
 LON: -80°48'20.90"

STREAM CROSSING #25
 STREAM F (PERENNIAL)
 (UNREGULATED FLOODPLAIN)
 EXISTING CULVERT /
 SPAN MAT BRIDGE
 LAT: 39°15'39.90"
 LON: -80°47'31.74"

IMPACT LOCATION MAP 2

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE, WEST VIRGINIA

Project Number: C-18422-0010
 Drawing Scale: 1"=200'
 Date Issued: DEC 2015
 Index Number:
 Drawn By: JTB
 Checked By: JTB
 Project Manager: JTB
APPENDIX B

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

APPENDIX C

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 1

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 1 of 11

Site/Property Information:		
Legal Description: Residential (Stream Crossing #2)		
Physical Address/911 Address: Parcel Tax ID: 8-14-7		
Decimal Latitude/Longitude: 39.268987 N / 80.801973 W		
DMS Latitude/Longitude: 39° 16' 08.22" N / 80° 48' 06.87" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Residential		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 1 of 11

Property Owner Data:		
Name of Primary Owner (PO): Dennis L and Sonya G Hayes		
PO Address: RT. 1 Box 45		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-3370		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.










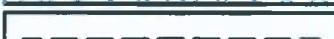


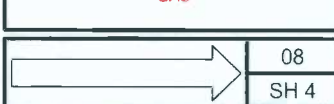







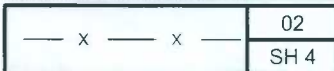



Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Mark B Smith		
Physical Address: PO Box 213		
City: Smithburg	State: WV	Zip: 26436
PO Primary Phone: 304-873-1973		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Mark B Smith		
Physical Address: PO Box 213		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1973		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Mark B Smith		
Physical Address: PO Box 213		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1973		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Denny D Hayes		
Physical Address: PO Box 213		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-3370		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	HISTORICAL GEOTECHNICAL ISSUES
 	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	08 SH 4 DIVERSION BERM
	07 SH 4 TURNOUT
 PLAN  PROFILE	06 SH 3 TRENCH PLUG
 PLAN  PROFILE	05 SH 3 WATERBAR
	03 SH 2 ROCK CONSTRUCTION ENTRANCE
	02 SH 4 ORANGE CONSTRUCTION FENCE
	04 SH 3 SPAN MAT BRIDGE
	10 SH 2 SILT FENCE
	03 SH 2 COMPOST FILTER SOCK
	11 SH 2 SUPER SILT FENCE

SITE PLAN LEGEND

Project Number C-18422-0010
 Drawing Scale 11.7.5
 Date Issued DEC 2015
 Index Number _____
 Drawn By JAS
 Checked By MEB
 Project Manager MEB

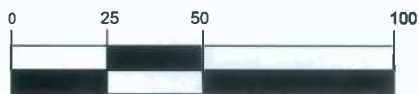
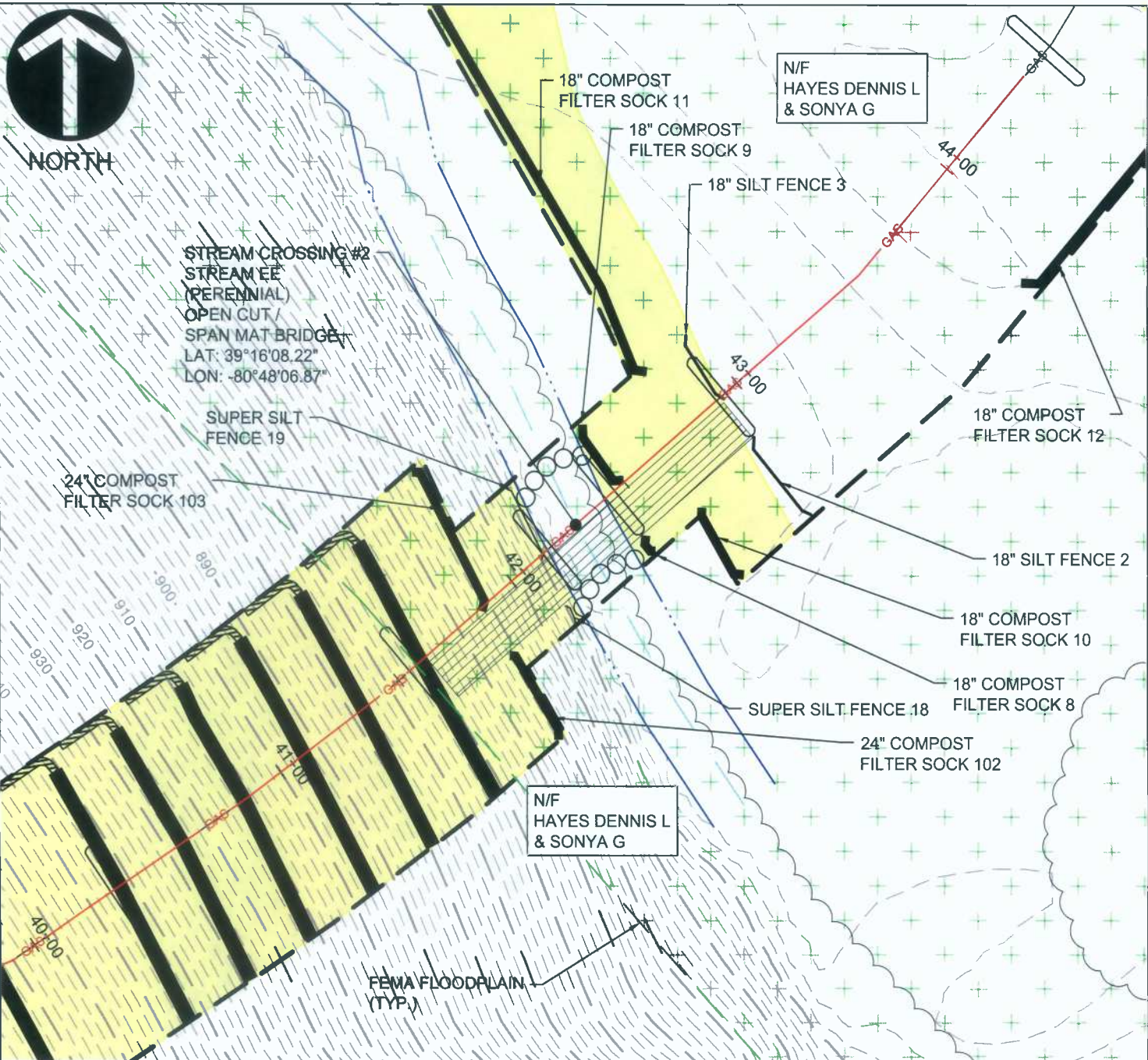
MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



(IN FEET)
 1 inch = 50 ft.

NOTE:
 THE PROPOSED PROJECT IS FOR THE
 INSTALLATION OF A NATURAL GAS
 PIPELINE. UPON INSTALLATION, THE
 FLOODPLAIN WILL BE RETURNED TO ITS
 PRE-CONSTRUCTION CONDITION.

STREAM CROSSING #2
 PLAN

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

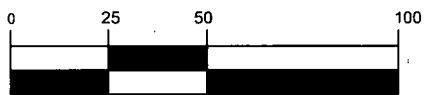
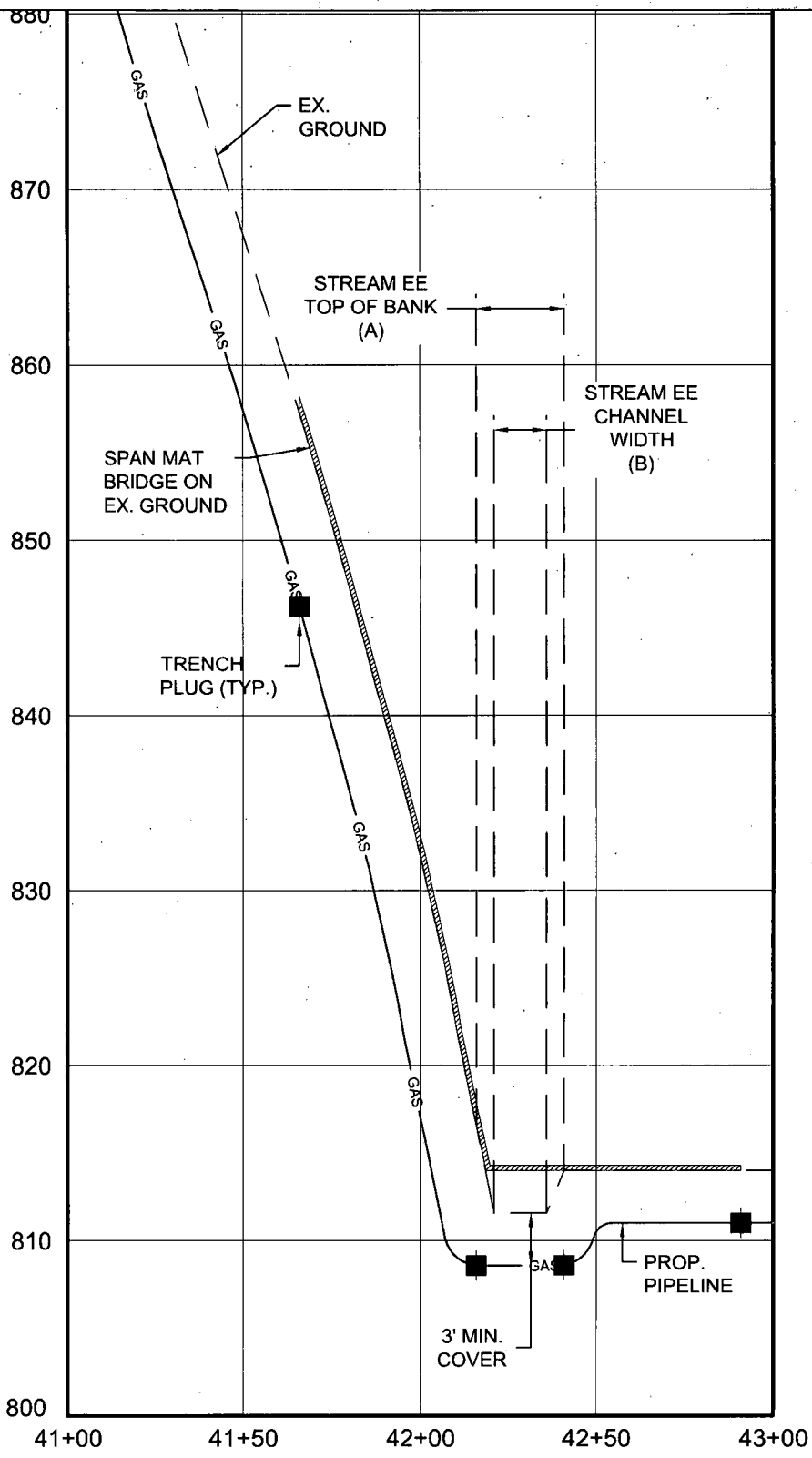
Project Number: C-18422-0010
 Drawing Scale: 1"=50'
 Date Issued: DEC, 2015
 Index Number:
 Drawn By: JLB
 Checked By: MEB
 Project Manager: MEB

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY®
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

APPENDIX C



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #2
PROFILE

Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Index Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB

APPENDIX C

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY[®]

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA

gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map - Impact 1



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p>Legend:</p> <ul style="list-style-type: none"> — Cross Section (XS) Lines — Base Flood Elevation (BFE) Lines Floodway <p>Flood Hazard Zone</p> <ul style="list-style-type: none"> Approximate Study (Zone A) Detailed Study (AE, AH, AO) Community Rating System Areas <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool</i> (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>		<p style="text-align: right;"><i>Map created on January 6, 2016</i></p> <p>Location of flood information ⊙ Stream Crossing #2</p> <p>User Notes: Stream Crossing #2</p>
<p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A</p> <p>Stream: Arnold Creek</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 826 ft</p> <p>Location (long, lat): (80.801973 W, 39.268987 N)</p> <p>Location (UTM 17N): (517083, 4346645)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: Arnold Creek</p> <p>Parcel Number:</p>		

APPENDIX D

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 2

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 2 of 11

Site/Property Information:		
Legal Description: Residential (Stream Crossing #7)		
Physical Address/911 Address: Parcel Tax ID: 1-7-89		
Decimal Latitude/Longitude: 39.285357 N / 80.812584 W		
DMS Latitude/Longitude: 39° 17' 07.10" N / 80° 48' 45.10" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Residential		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 2 of 11

Property Owner Data:		
Name of Primary Owner (PO): Alice Elizabeth Myer		
PO Address: RR 1 Box 260		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1949		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.
























Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Gregory R and Donna S Oliver		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Gilbert Wayne Neely ET UX		
Physical Address: 761 Central Road		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 307-873-2508		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ralph J and Judith Valentine		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Gilbert Wayne Neely ET UX		
Physical Address: 761 Central Road		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 307-873-2508		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	HISTORICAL GEOTECHNICAL ISSUES
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	08 SH 4 DIVERSION BERM
	07 SH 4 TURNOUT
 PLAN  PROFILE	06 SH 3 TRENCH PLUG
 PLAN  PROFILE	05 SH 3 WATERBAR
	03 SH 2 ROCK CONSTRUCTION ENTRANCE
	02 SH 4 ORANGE CONSTRUCTION FENCE
	04 SH 3 SPAN MAT BRIDGE
	10 SH 2 SILT FENCE
	03 SH 2 COMPOST FILTER SOCK
	11 SH 2 SUPER SILT FENCE

SITE PLAN LEGEND

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

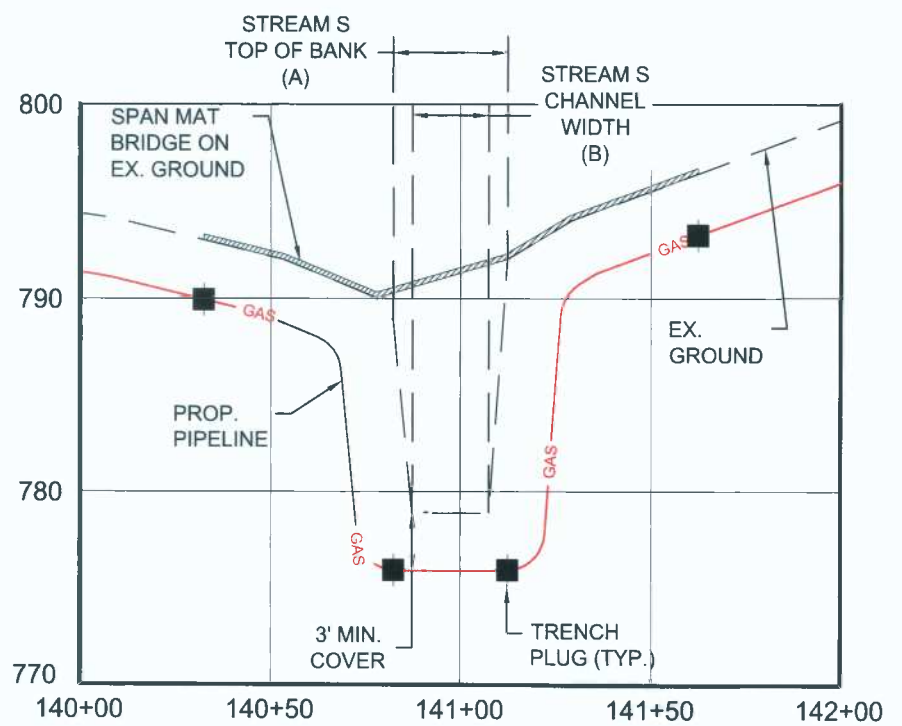
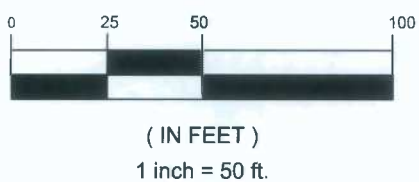
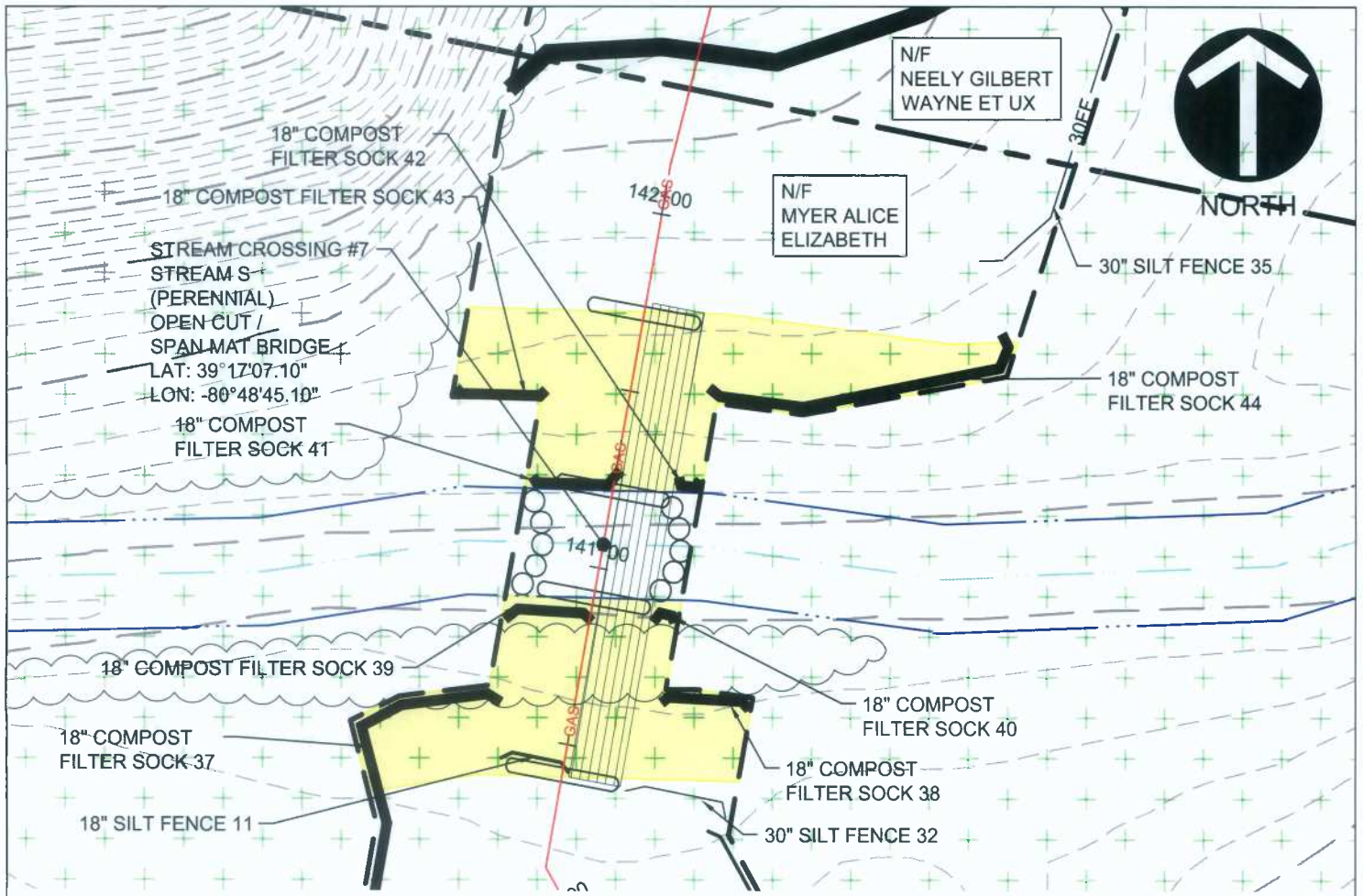
Project Number: C-16422-0010
 Drawing Scale: 1" = 5'
 Date issued: DEC 2015
 Index Number:
 Drawn By: LJS
 Checked By: MEB
 Project Manager: MEB

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



NOTE:
 THE PROPOSED PROJECT IS FOR THE INSTALLATION OF A NATURAL GAS PIPELINE. UPON INSTALLATION, THE FLOODPLAIN WILL BE RETURNED TO ITS PRE-CONSTRUCTION CONDITION.

STREAM CROSSING #7 PLAN AND PROFILE
 Project Number: C-18422-00-02
 Drawing Scale: 1"=50'
 Date Issued: DEC, 2015
 Index Number:
 Drawn By: JAS
 Checked By: MEB
 Project Manager: MEB
APPENDIX D

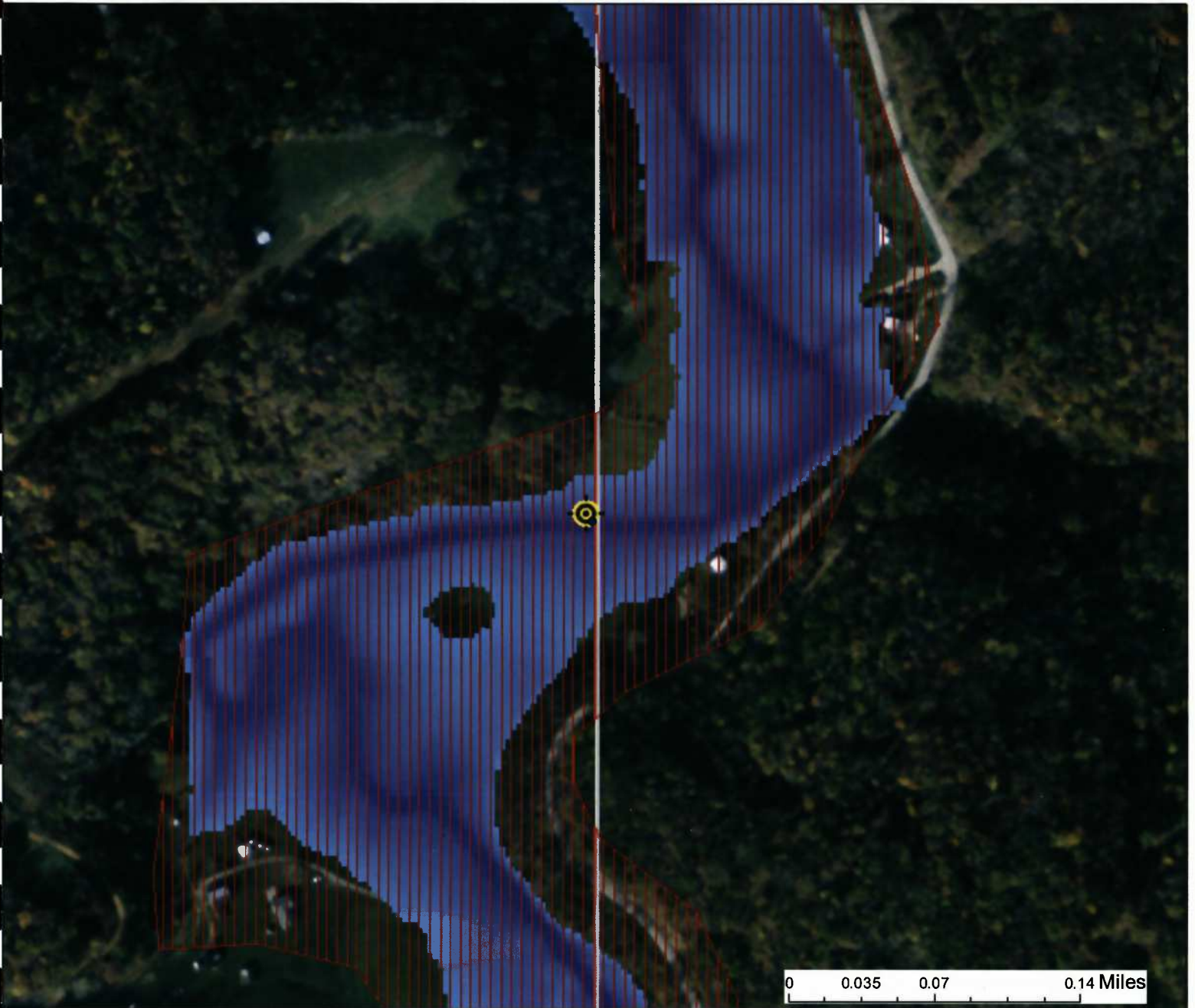
MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA
 PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284








© Gateway Engineers Inc. All Rights Reserved

WV Flood Map - Impact 2



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

Map created on January 6, 2016

	Cross Section (XS) Lines		Location of flood information
	Base Flood Elevation (BFE) Lines	User Notes:	
	Floodway		Stream Crossing #7
Flood Hazard Zone			
	Approximate Study (Zone A)		
	Detailed Study (AE, AH, AO)		
	Community Rating System Areas		

Disclaimer:
 The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov.
 WV Flood Tool (<http://www.MapWV.gov/flood>) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.

Flood Hazard Area:	Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.
Flood Hazard Zone:	A (Advisory A)
Stream:	Arnold Creek
FEMA Issued Flood Map:	54017C0115C
Watershed (HUC8):	Little Musringum-Middle Island (5030)
Advisory Flood Height:	About 799 ft
Water Depth:	About 6.3 ft (Source: HEC_RA)
Elevation:	About 791 ft
Location (long, lat):	(80.812584 W, 39.285357 N)
Location (UTM 17N):	(516164, 4348460)
Contacts:	Doddridge
CRS Information:	N/A
Flood Profile:	
HEC-RAS Model:	Arnold Creek
Parcel Number:	

APPENDIX E

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 3

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 3 of 11

Site/Property Information:		
Legal Description: Residential (Stream Crossing #8)		
Physical Address/911 Address:		
Decimal Latitude/Longitude: 39.289307 N / 80.814184 W		
DMS Latitude/Longitude: 39° 17' 21.34" N / 80° 48' 50.83" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Residential		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 3 of 11

Property Owner Data:

Name of Primary Owner (PO): Jonathan L. and Amanda D. Leggett

PO Address: 128 Caratelli Drive

City: West Union

State: WV

Zip: 26456

PO Primary Phone: 304-904-8944

PO Secondary Phone:

PO Primary Email:

Surface Rights Owner Data:

Name of Primary Owner (PO): N/A

PO Address:

City:

State:

Zip:

PO Primary Phone:

PO Secondary Phone:

PO Primary Email:

Mineral Rights Owner Data: (As Applicable)

Name of Primary Owner (PO): N/A

PO Address:

City:

State:

Zip:

PO Primary Phone:

PO Secondary Phone:

PO Primary Email:

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

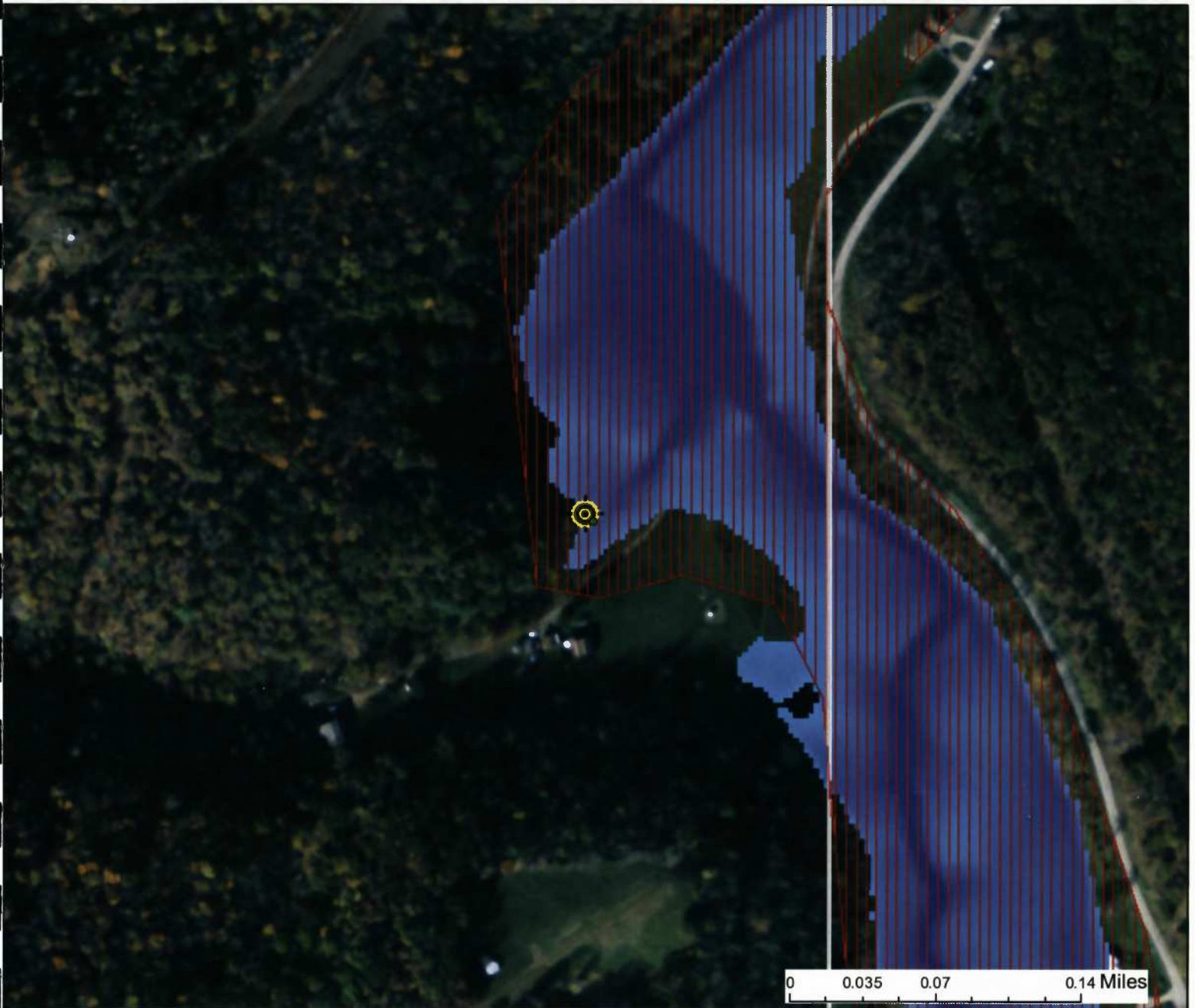
Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Allen and Vicky Cutright		
Physical Address: Rt 1 Box 326		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1382		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Russel and Theresa Lipscomb		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Allen and Vicky Cutright		
Physical Address: Rt 1 Box 326		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1382		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ellen Seavey Martin		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

WV Flood Map - Impact 3



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #8</p>	<p style="text-align: right;"><i>Map created on January 6, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: Arnold Creek</p> <p>FEMA Issued Flood Map: 54017C0115C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: About 797 ft</p> <p>Water Depth: About 1.5 ft (Source: HEC_RA)</p> <p>Elevation: About 795 ft</p> <p>Location (long, lat): (80.814184 W, 39.289307 N)</p> <p>Location (UTM 17N): (516025, 4348898)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: Arnold Creek</p> <p>Parcel Number:</p>
--	--	--	--



APPENDIX F

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 4

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 4 of 11

Site/Property Information:		
Legal Description: Residential (Stream Crossing #9)		
Physical Address/911 Address: Parcel Tax ID: 1-7-70.2		
Decimal Latitude/Longitude: 39.294513 N / 80.820171 W		
DMS Latitude/Longitude: 39° 17' 40.06" N / 80° 49' 12.34" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Residential		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 4 of 11

Property Owner Data:		
Name of Primary Owner (PO): America Ricky A ETUX and Albert R Richards ETUX		
PO Address: Rt 1 Box 325		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-2961		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

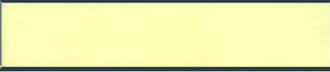

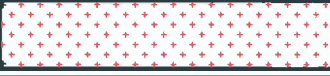








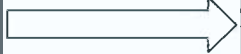





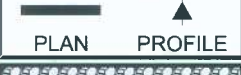





Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Howard Eakles		
Physical Address: 325 Rr 1		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-904-9983		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Howard Eakles		
Physical Address: 325 Rr 1		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-904-9983		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Clyde D Barr		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ronna J Lipscomb		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	HISTORICAL GEOTECHNICAL ISSUES
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	08 SH 4 DIVERSION BERM
	07 SH 4 TURNOUT
 PLAN  PROFILE	06 SH 3 TRENCH PLUG
 PLAN  PROFILE	05 SH 3 WATERBAR
	03 SH 2 ROCK CONSTRUCTION ENTRANCE
	02 SH 4 ORANGE CONSTRUCTION FENCE
	04 SH 3 SPAN MAT BRIDGE
	10 SH 2 SILT FENCE
	03 SH 2 COMPOST FILTER SOCK
	11 SH 2 SUPER SILT FENCE

SITE PLAN LEGEND

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

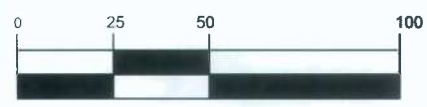
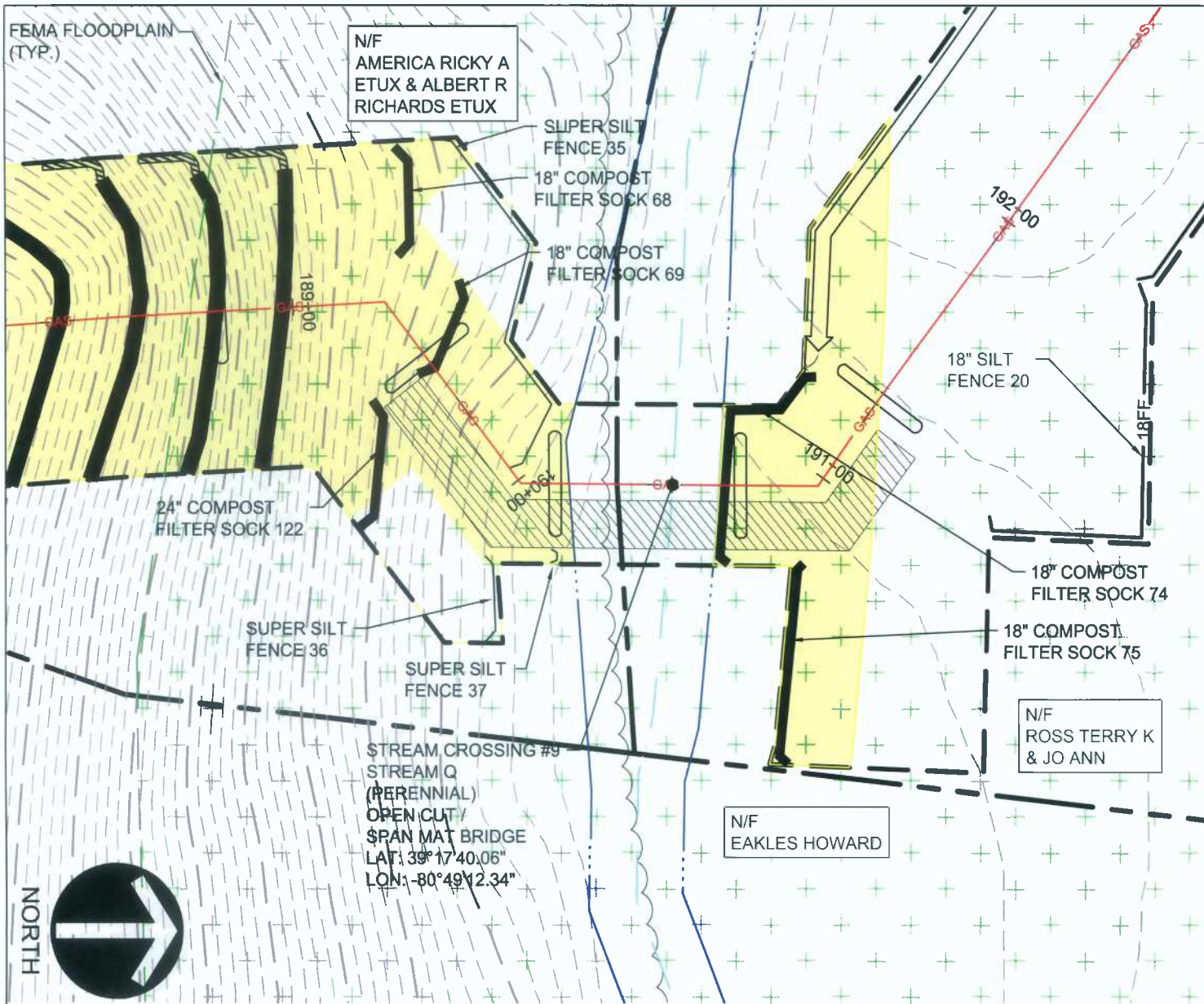
Project Number: C-18422-0010
 Drawing Scale: 1/1" = 1'-0"
 Date Issued: DEC 2016
 Index Number:
 Drawn By: TJS
 Checked By: MEB
 Project Manager: MEB

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



(IN FEET)
1 inch = 50 ft.

NOTE:
THE PROPOSED PROJECT IS FOR THE INSTALLATION OF A NATURAL GAS PIPELINE. UPON INSTALLATION, THE FLOODPLAIN WILL BE RETURNED TO ITS PRE-CONSTRUCTION CONDITION.

STREAM CROSSING #9
PLAN
Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date issued: DEC. 2015
Index Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB
APPENDIX F

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

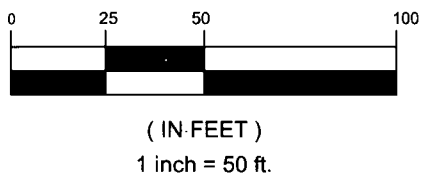
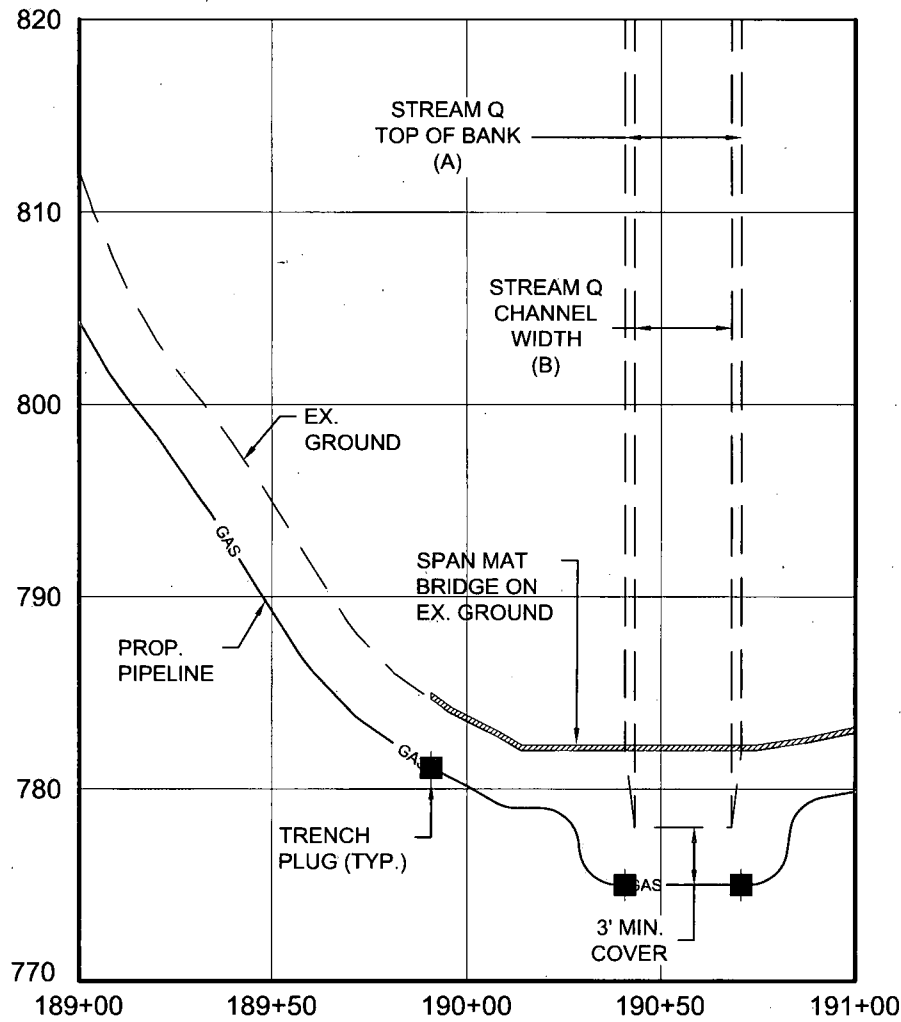
N/F AMERICA RICKY A
ETUX & ALBERT R
RICHARDS ETUX

N/F ROSS TERRY K
& JO ANN

N/F EAKLES HOWARD

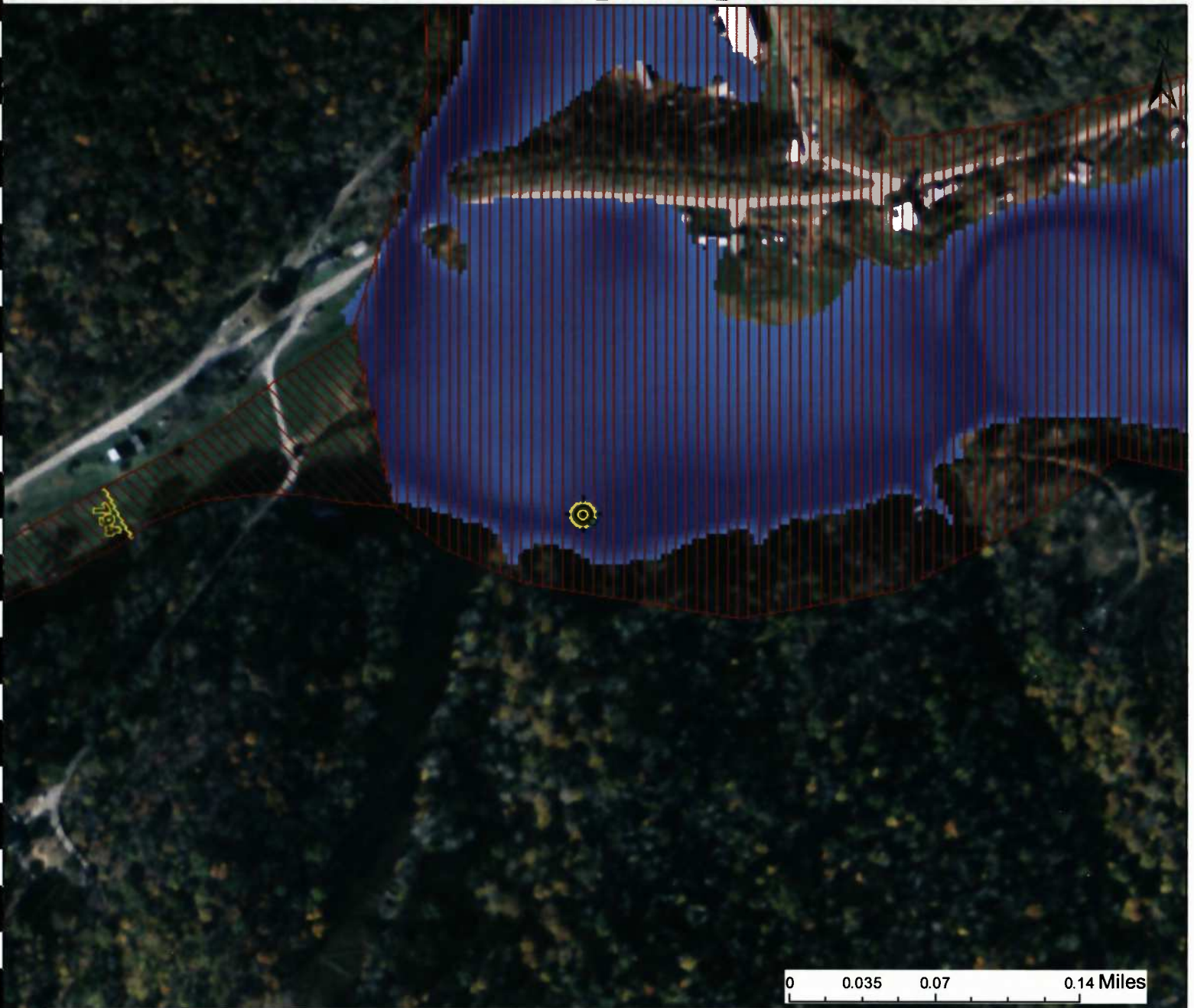
GATEWAY[®]
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

© Gateway Engineers Inc. All Rights Reserved



<p>STREAM CROSSING #9 PROFILE</p> <p>Project Number: C-18422-0910 Drawing Scale: 1"=50' Date Issued: DEC. 2016 Index Number: Drawn By: TJS Checked By: MEB Project Manager: MEB</p> <p>APPENDIX F</p>	<p>MOSA D003 / MOSA S036 PIPELINE DODDRIDGE COUNTY, WEST VIRGINIA</p> <p>PREPARED FOR: EQM GATHERING OPCO, LLC 625 LIBERTY AVENUE PITTSBURGH, PENNSYLVANIA 15222</p>	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th>Date</th> <th>No.</th> <th>REVISION RECORD</th> </tr> </thead> <tbody> <tr><td>-</td><td>01</td><td>-</td></tr> <tr><td>-</td><td>02</td><td>-</td></tr> <tr><td>-</td><td>03</td><td>-</td></tr> <tr><td>-</td><td>04</td><td>-</td></tr> <tr><td>-</td><td>05</td><td>-</td></tr> <tr><td>-</td><td>06</td><td>-</td></tr> <tr><td>-</td><td>07</td><td>-</td></tr> <tr><td>-</td><td>08</td><td>-</td></tr> </tbody> </table>	Date	No.	REVISION RECORD	-	01	-	-	02	-	-	03	-	-	04	-	-	05	-	-	06	-	-	07	-	-	08	-	<p>The Gateway Engineers, Inc. Full-Service Civil Engineering & Surveying Pittsburgh, PA</p> <p>gatewayengineers.com 855-634-9284</p>
Date	No.	REVISION RECORD																												
-	01	-																												
-	02	-																												
-	03	-																												
-	04	-																												
-	05	-																												
-	06	-																												
-	07	-																												
-	08	-																												

WV Flood Map - Impact 4



0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #9</p>	<p>Map created on January 6, 2016</p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: Arnold Creek</p> <p>FEMA Issued Flood Map: 54017C0115C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: About 791 ft</p> <p>Water Depth: About 8.9 ft (Source: HEC_RA)</p> <p>Elevation: About 782 ft</p> <p>Location (long, lat): (80.820171 W, 39.294513 N)</p> <p>Location (UTM 17N): (515507, 4349474)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: Arnold Creek</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>			

APPENDIX G

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 5

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 5 of 11

Site/Property Information:		
Legal Description: Commercial (Stream Crossing #10)		
Physical Address/911 Address: Parcel Tax ID: 1-7-13		
Decimal Latitude/Longitude: 39.299057 N / 80.820970 W		
DMS Latitude/Longitude: 39° 17' 56.47" N / 80° 49' 15.26" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Residential		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 5 of 11

Property Owner Data:		
Name of Primary Owner (PO): Equitrans, INC.		
PO Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 724-873-3009		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

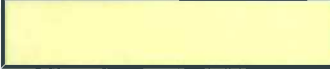









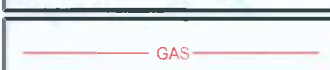












Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ronna J Lipscomb		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): EQM Gathering Opco, LLC		
PO Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 724-873-3009		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): George D Lambert		
Physical Address: 12 Townridge Acres		
City: Mullens	State: WV	Zip: 25882
PO Primary Phone: 304-294-8432		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): William Ponder Seahorn III and Ruth Rebecca Johnson		
Physical Address: PO Box 1483		
City: Ozona	State: TX	Zip: 76943
PO Primary Phone: 325-392-3386		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	HISTORICAL GEOTECHNICAL ISSUES
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	08 SH 4 DIVERSION BERM
	07 SH 4 TURNOUT
 PLAN  PROFILE	06 SH 3 TRENCH PLUG
 PLAN  PROFILE	05 SH 3 WATERBAR
	03 SH 2 ROCK CONSTRUCTION ENTRANCE
	02 SH 4 ORANGE CONSTRUCTION FENCE
	04 SH 3 SPAN MAT BRIDGE
	10 SH 2 SILT FENCE
	03 SH 2 COMPOST FILTER SOCK
	11 SH 2 SUPER SILT FENCE

SITE PLAN LEGEND

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

Project Number: C-18422-0010
 Drawing Scale: N.T.S.
 Date Issued: DEC. 2015
 Index Number:
 Drawn By: J.S.
 Checked By: M.E.B.
 Project Manager: M.E.B.

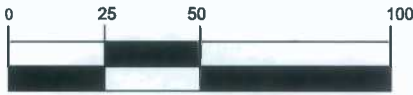
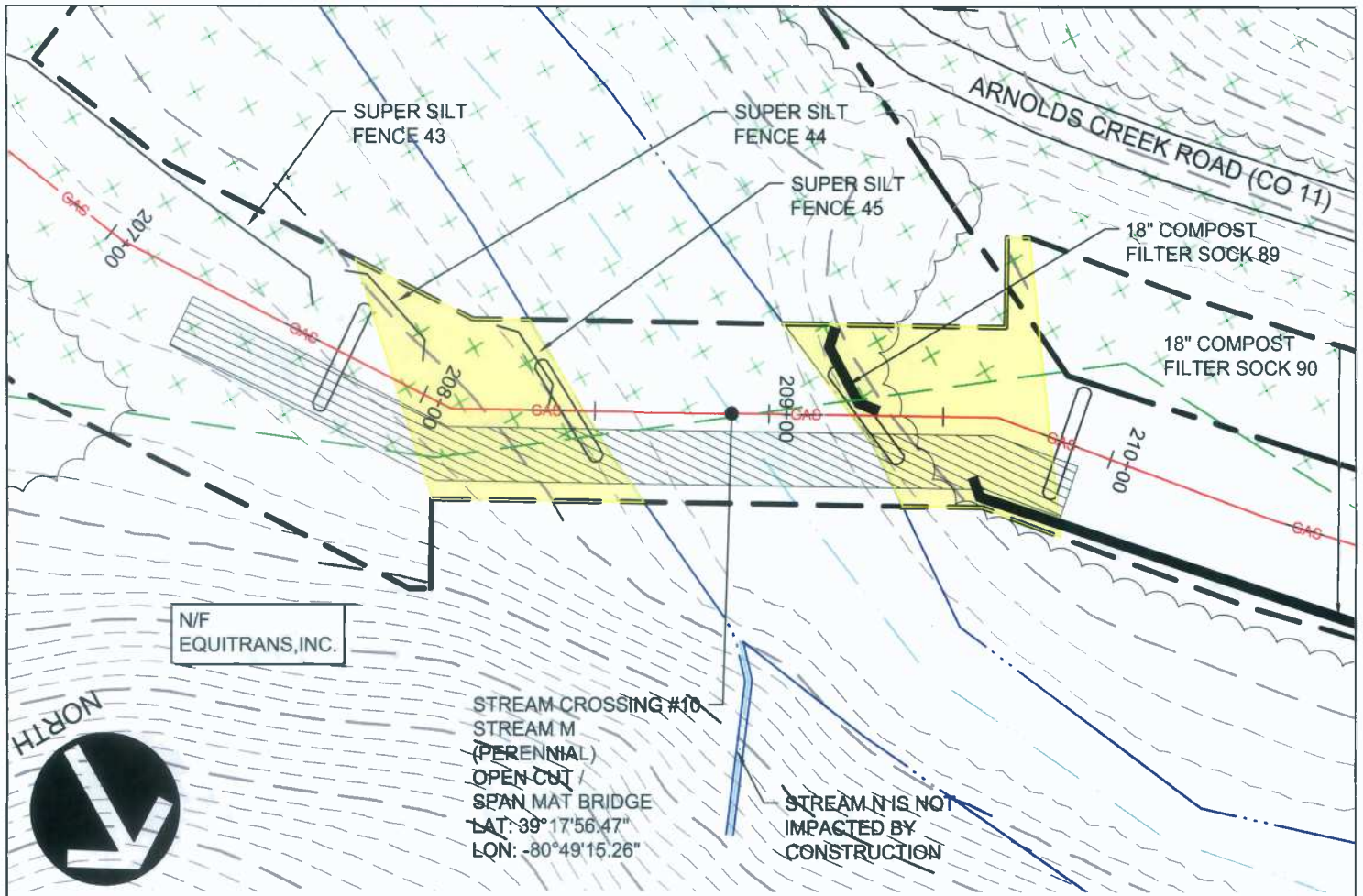
LEGEND



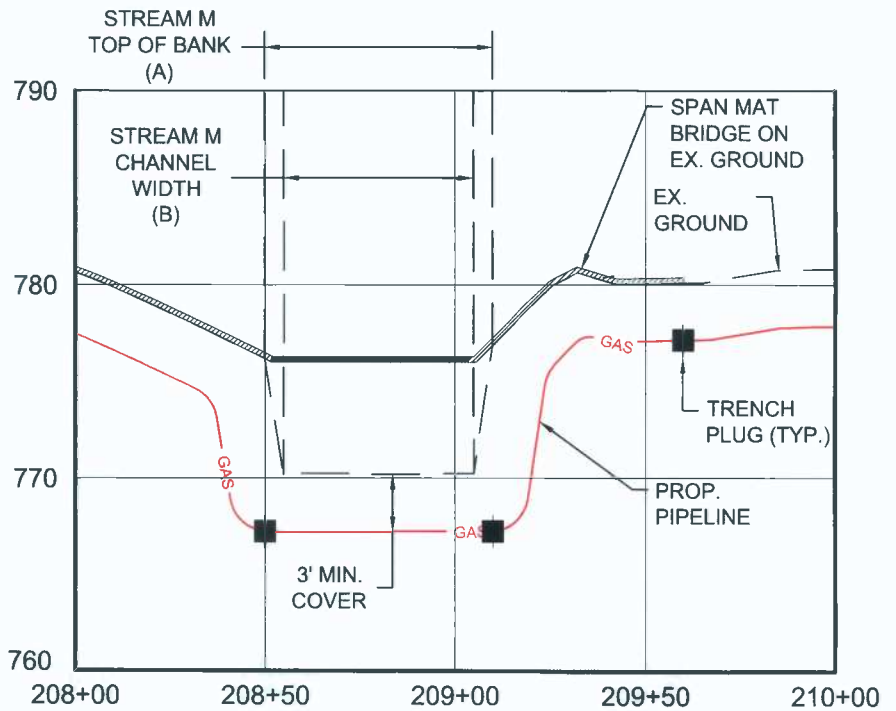
GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers Inc. All Rights Reserved



(IN FEET)
1 inch = 50 ft.



STREAM CROSSING #10 PLAN AND PROFILE
 Project Number: C-18422-0010
 Drawing Scale: 1"=50'
 Date Issued: DEC. 2016
 Index Number:
 Drawn By: JLS
 Checked By: MEB
 Project Manager: MEB
 APPENDIX G

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA
 PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers Inc. All Rights Reserved

WV Flood Map - Impact 5



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p>— Cross Section (XS) Lines</p> <p>— Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #10</p>	<p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: Arnold Creek</p> <p>FEMA Issued Flood Map: 54017C0115C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: About 788 ft</p> <p>Water Depth: About 12.4 ft (Source: HEC_R)</p> <p>Elevation: About 776 ft</p> <p>Location (long, lat): (80.820970 W, 39.299057 N)</p> <p>Location (UTM 17N): (515437, 4349979)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: Arnold Creek</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

APPENDIX H

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 6

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 6 of 11

Site/Property Information:		
Legal Description: Vacant Lot (Stream Crossing #11)		
Physical Address/911 Address: Parcel Tax ID: 1-7-14.1		
Decimal Latitude/Longitude: 39.299929 N / 80.822161 W		
DMS Latitude/Longitude: 39° 17' 59.56" N / 80° 49' 19.56" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Vacant Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 6 of 11

Property Owner Data:		
Name of Primary Owner (PO): George D Lambert		
PO Address: 12 Townridge Acres		
City: Mullens	State: WV	Zip: 25882
PO Primary Phone: 304-294-8432		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

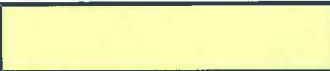


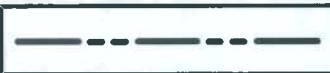





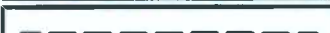


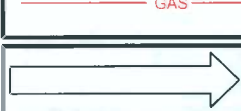





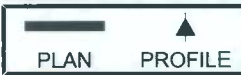
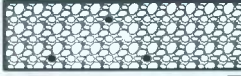




Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Equitrans, INC.		
Physical Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 724-873-3009		
PO Secondary Phone:		
PO Primary Email:		


Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ronna J Lipscomb		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): William Ponder Seahorn III and Ruth Rebecca Johnson		
Physical Address: PO Box 1483		
City: Ozona	State: TX	Zip: 76943
PO Primary Phone: 325-392-3386		
PO Secondary Phone:		
PO Primary Email:		

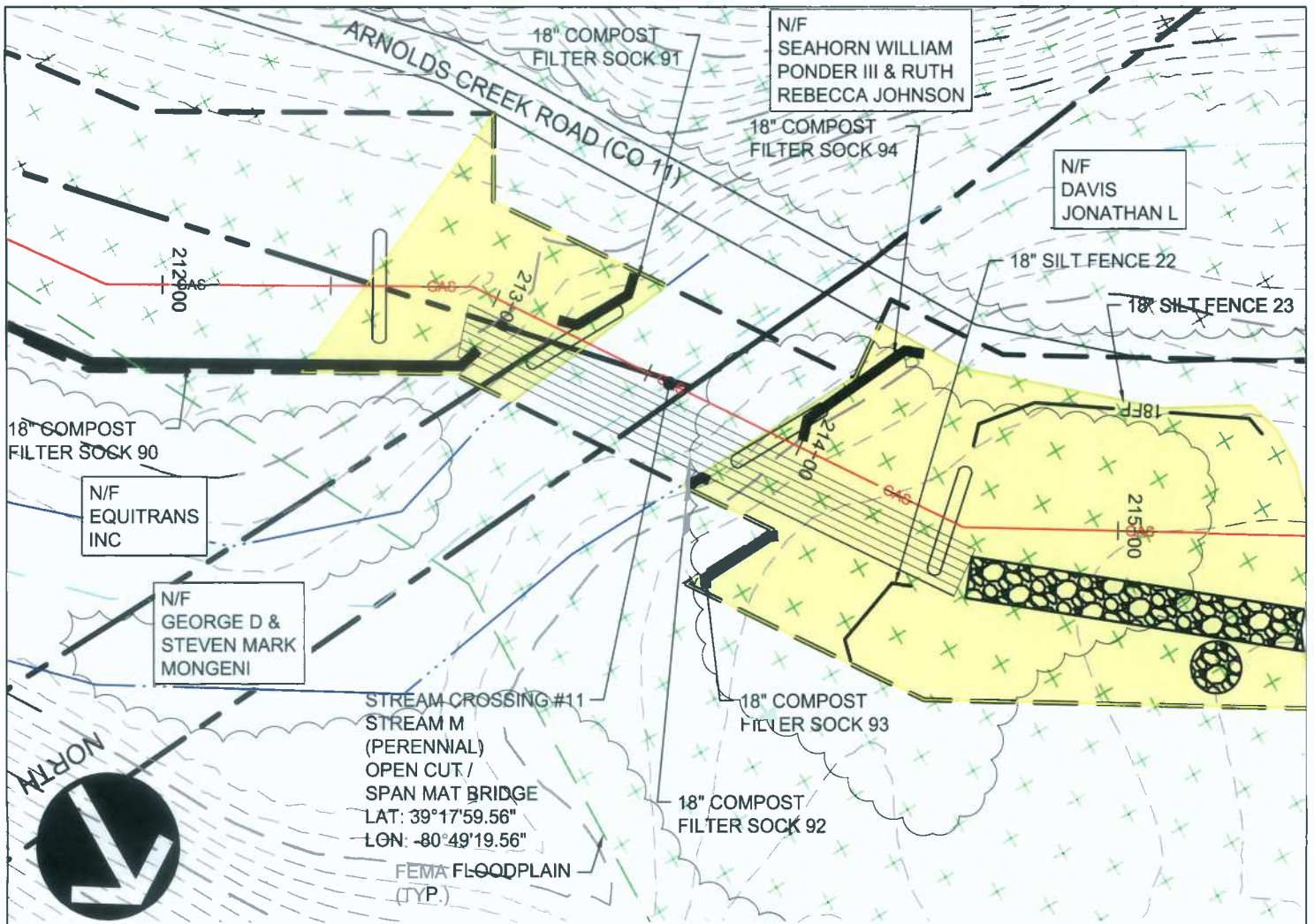
Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Jonathan L Davis		
Physical Address: 3175 Sam Cavins Road		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1916		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	HISTORICAL GEOTECHNICAL ISSUES
 	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	08 SH 4 DIVERSION BERM
	07 SH 4 TURNOUT
 PLAN  PROFILE	06 SH 3 TRENCH PLUG
 PLAN  PROFILE	05 SH 3 WATERBAR
	03 SH 2 ROCK CONSTRUCTION ENTRANCE
	02 SH 4 ORANGE CONSTRUCTION FENCE
	04 SH 3 SPAN MAT BRIDGE
	10 SH 2 SILT FENCE
	03 SH 2 COMPOST FILTER SOCK
	11 SH 2 SUPER SILT FENCE

SITE PLAN LEGEND Project Number: C-18422-0010 Drawing Scale: 1/4" = 1'-0" Date Issued: DEC 2015 Index Number: Drawn By: JLS Checked By: MEB Project Manager: MEB LEGEND	MOSA D003 / MOSA S036 PIPELINE DODDRIDGE COUNTY, WEST VIRGINIA PREPARED FOR: EQM GATHERING OPCO, LLC 625 LIBERTY AVENUE PITTSBURGH, PENNSYLVANIA 15222	<table border="1"> <thead> <tr> <th>Date</th> <th>No</th> <th>REVISION RECORD</th> </tr> </thead> <tbody> <tr><td>-</td><td>01</td><td>-</td></tr> <tr><td>-</td><td>02</td><td>-</td></tr> <tr><td>-</td><td>03</td><td>-</td></tr> <tr><td>-</td><td>04</td><td>-</td></tr> <tr><td>-</td><td>05</td><td>-</td></tr> <tr><td>-</td><td>06</td><td>-</td></tr> <tr><td>-</td><td>07</td><td>-</td></tr> <tr><td>-</td><td>08</td><td>-</td></tr> </tbody> </table>	Date	No	REVISION RECORD	-	01	-	-	02	-	-	03	-	-	04	-	-	05	-	-	06	-	-	07	-	-	08	-	 GATEWAY [®] The Gateway Engineers, Inc. Full-Service Civil Engineering & Surveying Pittsburgh, PA gatewayengineers.com 855-634-9284
	Date	No	REVISION RECORD																											
-	01	-																												
-	02	-																												
-	03	-																												
-	04	-																												
-	05	-																												
-	06	-																												
-	07	-																												
-	08	-																												
Path & Filename: G:\Projects\180001\18422 EQT\0010 MOSA D003 Pipeline\Drawings\Sheet\18422-0010_Floodplain Application Plans.dwg Plot Date: 1/6/2016 1:38 PM Thomas J. Stronczak Save Date: 1/6/2016 1:38 PM																														

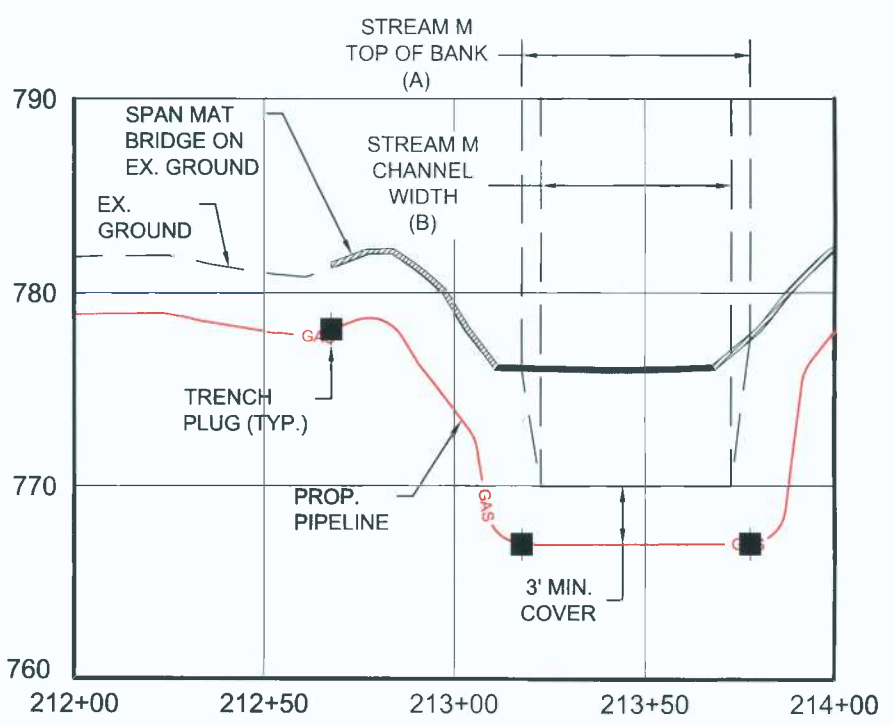
© Gateway Engineers Inc. All Rights Reserved



STREAM CROSSING #11
 STREAM M
 (PERENNIAL)
 OPEN CUT /
 SPAN MAT BRIDGE
 LAT: 39°17'59.56"
 LGN: -80°49'19.56"
 FEMA FLOODPLAIN
 (TYP.)



(IN FEET)
 1 inch = 50 ft.



NOTE:
 THE PROPOSED PROJECT IS FOR THE
 INSTALLATION OF A NATURAL GAS
 PIPELINE. UPON INSTALLATION,
 THE FLOODPLAIN WILL BE RETURNED
 TO ITS PRE-CONSTRUCTION
 CONDITION.

STREAM CROSSING #11
 PLAN AND PROFILE
 Project Number: C-18422-0010
 Drawing Scale: 1"=50'
 Date Issued: DEC. 2015
 Index Number:
 Drawn By: LJS
 Checked By: MEB
 Project Manager: MEB
APPENDIX H

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA
 PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY®
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284








© Gateway Engineers Inc. All Rights Reserved

WV Flood Map - Impact 6



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

Map created on January 7, 2016

<ul style="list-style-type: none">  Cross Section (XS) Lines  Base Flood Elevation (BFE) Lines  Floodway <p>Flood Hazard Zone</p> <ul style="list-style-type: none">  Approximate Study (Zone A)  Detailed Study (AE, AH, AO)  Community Rating System Areas <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>	<ul style="list-style-type: none">  Location of flood information <p>User Notes: Stream Crossing #11</p>
--	--

Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.	
Flood Hazard Zone:	A (Advisory A)
Stream:	Arnold Creek
FEMA Issued Flood Map:	54017C0115C
Watershed (HUC8):	Little Musringum-Middle Island (5030)
Advisory Flood Height:	About 787 ft
Water Depth:	About 11.2 ft (Source: HEC_R)
Elevation:	About 776 ft
Location (long, lat):	(80.822161 W, 39.299929 N)
Location (UTM 17N):	(515334, 4350075)
Contacts:	Doddridge
CRS Information:	N/A
Flood Profile:	
HEC-RAS Model:	Arnold Creek
Parcel Number:	

APPENDIX I

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 7

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 7 of 11

Site/Property Information:		
Legal Description: Vacant Lot (Stream Crossing #14)		
Physical Address/911 Address: Parcel Tax ID: 8-14-18		
Decimal Latitude/Longitude: 39.261511 N / 80.808793 W		
DMS Latitude/Longitude: 39° 15' 41.25" N / 80° 48' 31.44" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Vacant Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 7 of 11

Property Owner Data:		
Name of Primary Owner (PO): Michael J and Jennifer L Mignanelli		
PO Address: 123 Scott Ridge Road		
City: Harmony	State: PA	Zip: 16037
PO Primary Phone: 724-452-9720		
PO Secondary Phone: 412-996-6659		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): EQM Gathering Opco, LLC		
Physical Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 724-873-3009		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): EQM Gathering Opco, LLC		
Physical Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 724-873-3009		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): EQM Gathering Opco, LLC		
Physical Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 724-873-3009		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Lorie M Doll		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR 908 MINOR	EXISTING CONTOURS
	FEMA FLOODPLAIN
	HISTORICAL GEOTECHNICAL ISSUES
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	08 SH 4 DIVERSION BERM
	07 SH 4 TURNOUT
PLAN PROFILE	06 SH 3 TRENCH PLUG
PLAN PROFILE	05 SH 3 WATERBAR
	03 SH 2 ROCK CONSTRUCTION ENTRANCE
	02 SH 4 ORANGE CONSTRUCTION FENCE
	04 SH 3 SPAN MAT BRIDGE
	10 SH 2 SILT FENCE
	03 SH 2 COMPOST FILTER SOCK
	11 SH 2 SUPER SILT FENCE

SITE PLAN LEGEND

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

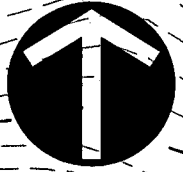
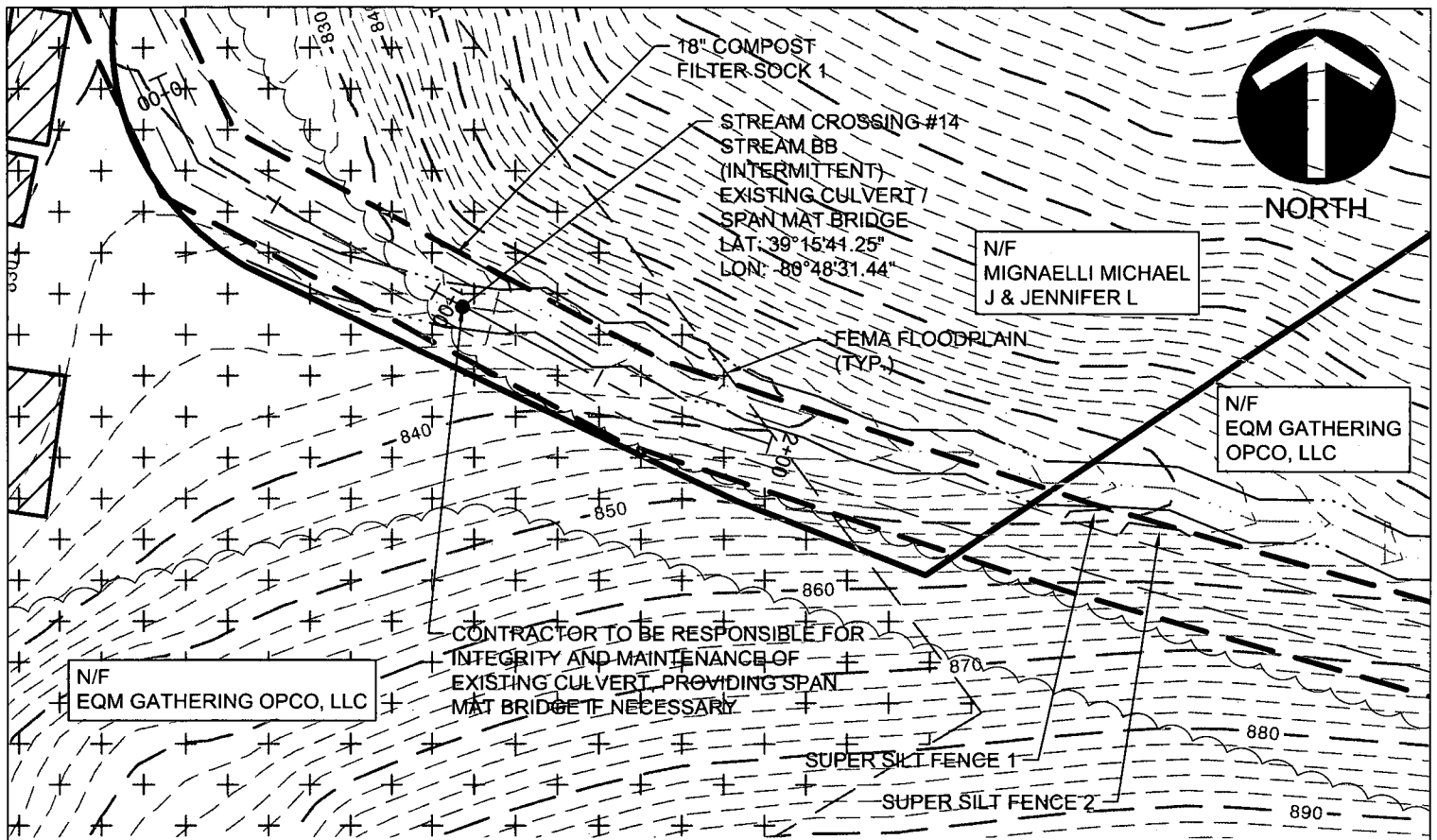
Project Number: C-18422-0010
 Drawing Scale: 3/16" = 1'-0"
 Date Issued: DEC. 2015
 Index Number:
 Drawn By: TJS
 Checked By: MEB
 Project Manager: MEB

LEGEND

GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved



18" COMPOST
FILTER SOCK 1

STREAM CROSSING #14
STREAM BB
(INTERMITTENT)
EXISTING CULVERT /
SPAN MAT BRIDGE
LAT: 39°15'41.25"
LON: 89°48'31.44"

N/F
MIGNAELLI MICHAEL
J & JENNIFER L

N/F
EQM GATHERING
OPCO, LLC

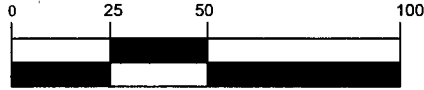
FEMA FLOODPLAIN
(TYP.)

N/F
EQM GATHERING OP
CO, LLC

CONTRACTOR TO BE RESPONSIBLE FOR
INTEGRITY AND MAINTENANCE OF
EXISTING CULVERT, PROVIDING SPAN
MAT BRIDGE IF NECESSARY

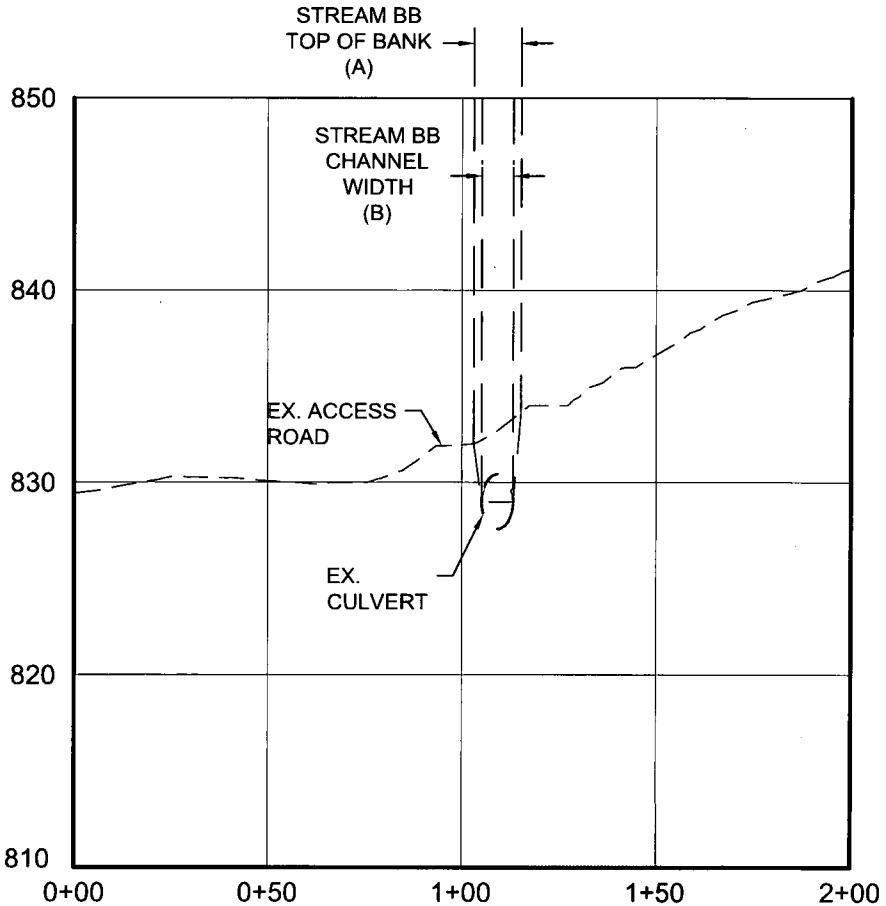
SUPER SILT FENCE 1

SUPER SILT FENCE 2



(IN FEET)
1 inch = 50 ft.

NOTE:
THE PROPOSED PROJECT IS FOR THE
INSTALLATION OF A NATURAL GAS
PIPELINE. UPON INSTALLATION, THE
FLOODPLAIN WILL BE RETURNED TO ITS
PRE-CONSTRUCTION CONDITION.



STREAM CROSSING
#14 PLAN AND
PROFILE

Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Index Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
**EQM GATHERING OP
CO, LLC**
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

APPENDIX I

WV Flood Map - Impact 7



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #14</p>	<p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A</p> <p>Stream: Right Fork Arnold Creek</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 830 ft</p> <p>Location (long, lat): (80.808793 W, 39.261511 N)</p> <p>Location (UTM 17N): (516496, 4345814)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: Right Fork Arnold Creek</p> <p>Parcel Number:</p>
--	--	---	---

APPENDIX J

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 8

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 8 of 11

Site/Property Information:		
Legal Description: Vacant Lot (Stream Crossing #2)		
Physical Address/911 Address: Parcel Tax ID: 1-7-87.3		
Decimal Latitude/Longitude: 39.290106 N / 80.813159 W		
DMS Latitude/Longitude: 39° 17' 24.20" N / 80° 48' 47.15" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Vacant Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 8 of 11

Property Owner Data:		
Name of Primary Owner (PO): Allen and Vicky Cutright		
PO Address: RT 1 Box 326		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1382		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.








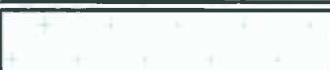

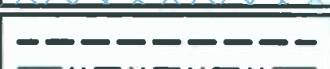













Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ellen Seavey Martin		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Gilbert Wayne Neely ET UX		
Physical Address: 761 Central Station Rd		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-2508		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Jonathan L. and Amanda D. Leggett		
Physical Address: 128 Caratelli Drive		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-904-8944		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ellen Seavey Martin		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR  908	EXISTING CONTOURS
	FEMA FLOODPLAIN
	HISTORICAL GEOTECHNICAL ISSUES
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	08 SH 4 DIVERSION BERM
	07 SH 4 TURNOUT
 PLAN  PROFILE	06 SH 3 TRENCH PLUG
 PLAN  PROFILE	05 SH 3 WATERBAR
	03 SH 2 ROCK CONSTRUCTION ENTRANCE
	02 SH 4 ORANGE CONSTRUCTION FENCE
	04 SH 3 SPAN MAT BRIDGE
	10 SH 2 SILT FENCE
	03 SH 2 COMPOST FILTER SOCK
	11 SH 2 SUPER SILT FENCE

SITE PLAN LEGEND

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

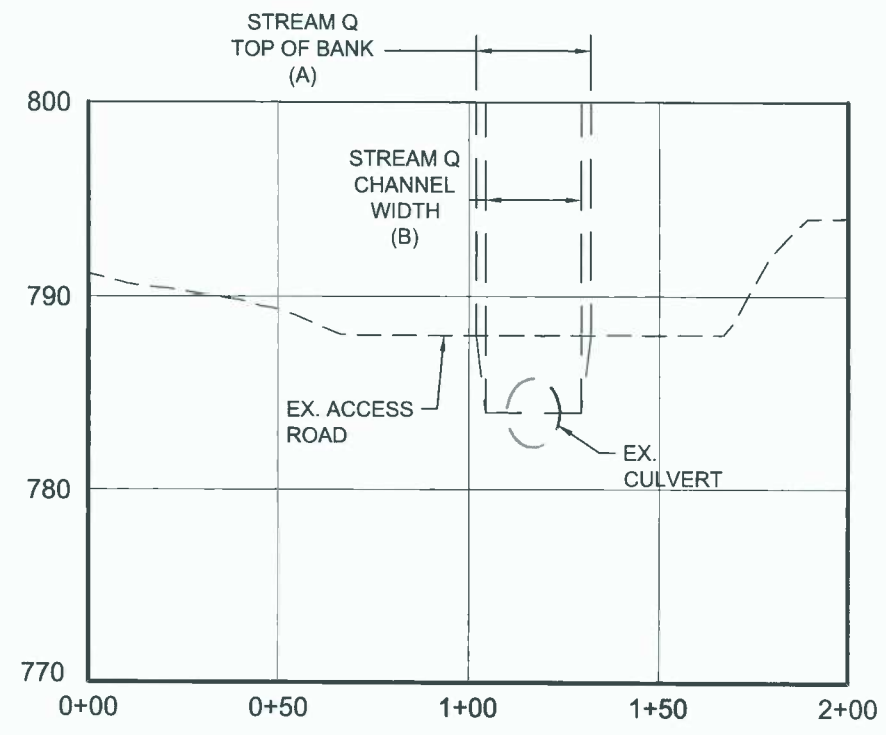
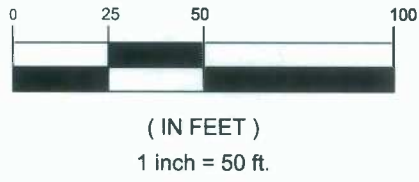
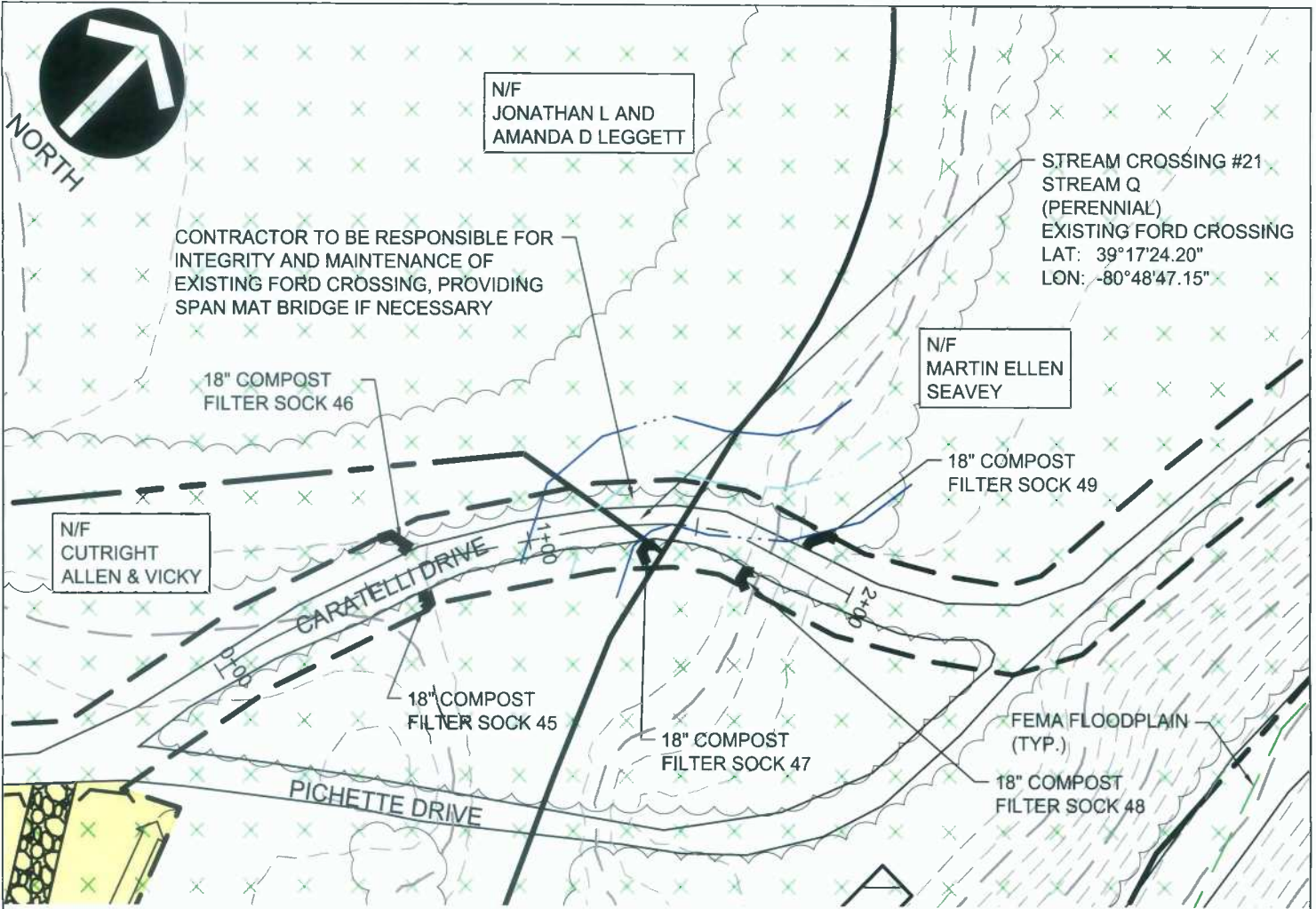
Project Number: C-18422-0010
 Drawing Scale: 3/16"
 Date Issued: DEC 2015
 Index Number:
 Drawn By: JLS
 Checked By: MEB
 Project Manager: MEB

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



NOTE:
THE PROPOSED PROJECT IS FOR THE INSTALLATION OF A NATURAL GAS PIPELINE. UPON INSTALLATION, THE FLOODPLAIN WILL BE RETURNED TO ITS PRE-CONSTRUCTION CONDITION.

STREAM CROSSING #21 PLAN AND PROFILE
Project Number C-18422-0010
Drawing Scale 1"=50'
Date Issued DEC 2015
Index Number
Drawn By JLS
Checked By MEB
Project Manager MEB

APPENDIX J

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

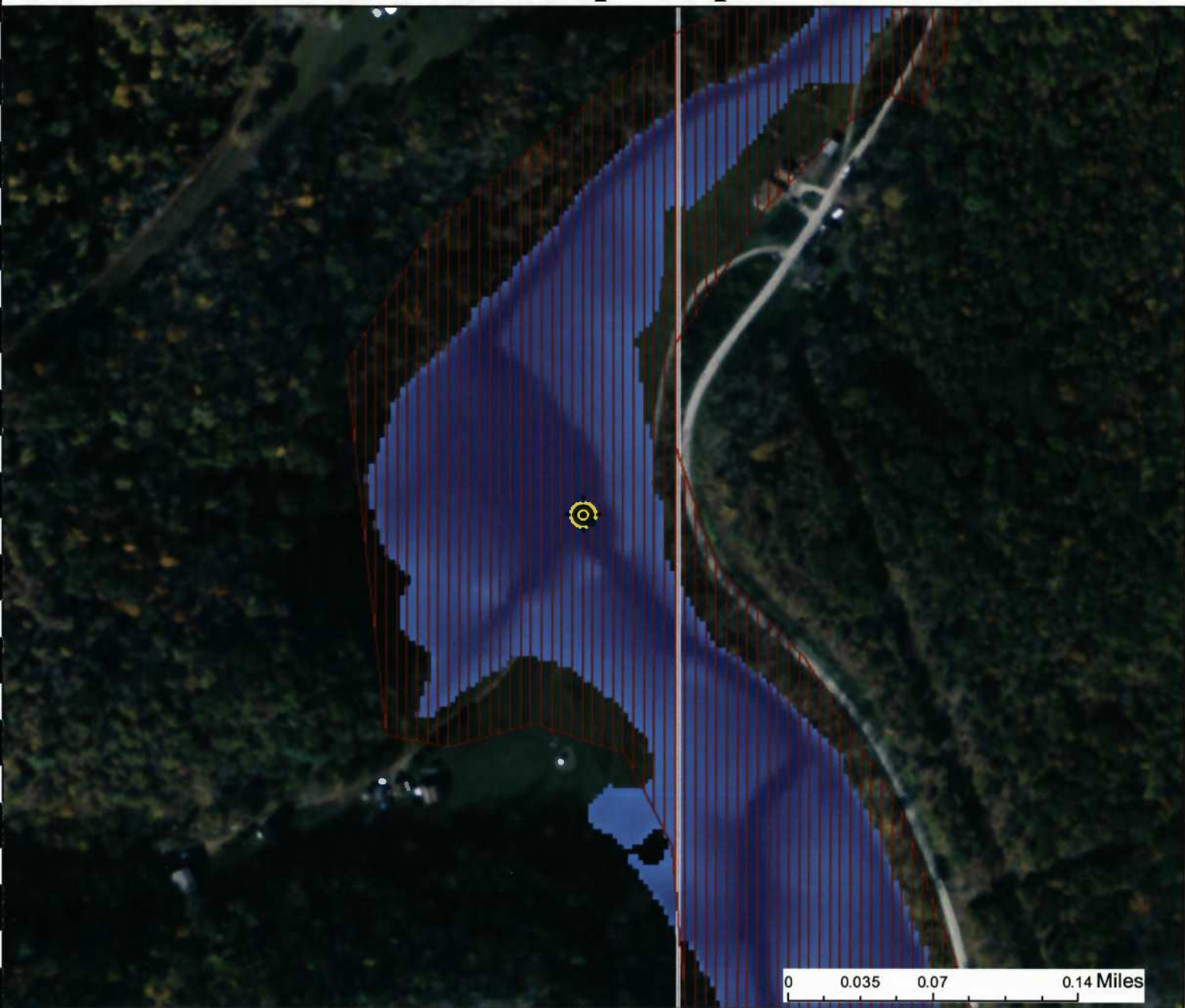
Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY®

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

© Gateway Engineers Inc. All Rights Reserved

WV Flood Map - Impact 8



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p>Legend:</p> <ul style="list-style-type: none"> — Cross Section (XS) Lines — Base Flood Elevation (BFE) Lines Floodway <p>Flood Hazard Zone</p> <ul style="list-style-type: none"> Approximate Study (Zone A) Detailed Study (AE, AH, AO) Community Rating System Areas <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p>User Notes: Stream Crossing #21</p> <p>Map created on January 7, 2016</p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: Arnold Creek</p> <p>FEMA Issued Flood Map: 54017C0115C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: About 796 ft</p> <p>Water Depth: About 9.5 ft (Source: HEC_RA)</p> <p>Elevation: About 787 ft</p> <p>Location (long, lat): (80.813159 W, 39.290106 N)</p> <p>Location (UTM 17N): (516113, 4348987)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: Arnold Creek</p> <p>Parcel Number:</p>
---	--	--

APPENDIX K

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 9

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 9 of 11

Site/Property Information:		
Legal Description: Residential (Stream Crossing #22)		
Physical Address/911 Address: Parcel Tax ID: 1-7-14		
Decimal Latitude/Longitude: 39.294905 N / 80.817891 W		
DMS Latitude/Longitude: 39° 17' 41.48" N / 80° 49' 04.12" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Residential		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 9 of 11

Property Owner Data:		
Name of Primary Owner (PO): Howard Eakles		
PO Address: 325 Rr. 1		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1566		
PO Secondary Phone: 304-904-9983		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

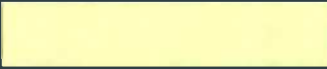






















Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Howard Eakles		
PO Address: 325 Rr. 1		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-904-9983		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Harry D Sr. and Christina Arnold		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): America Ricky A ET UX and Albert R Richards ET UX		
Physical Address: Rt 1 Box 325		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-2961		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): EQM Gathering Opco, LLC		
Physical Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 724-873-3009		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	HISTORICAL GEOTECHNICAL ISSUES
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	08 SH 4 DIVERSION BERM
	07 SH 4 TURNOUT
 PLAN  PROFILE	06 SH 3 TRENCH PLUG
 PLAN  PROFILE	05 SH 3 WATERBAR
	03 SH 2 ROCK CONSTRUCTION ENTRANCE
	02 SH 4 ORANGE CONSTRUCTION FENCE
	04 SH 3 SPAN MAT BRIDGE
	10 SH 2 SILT FENCE
	03 SH 2 COMPOST FILTER SOCK
	11 SH 2 SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: C-18422-0010
 Drawing Scale: 1/4" = 1'-0"
 Date Issued: DEC 2015
 Index Number:
 Drawn By: JLS
 Checked By: MEB
 Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

LEGEND

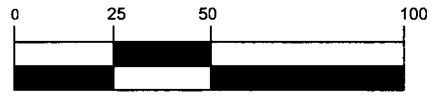
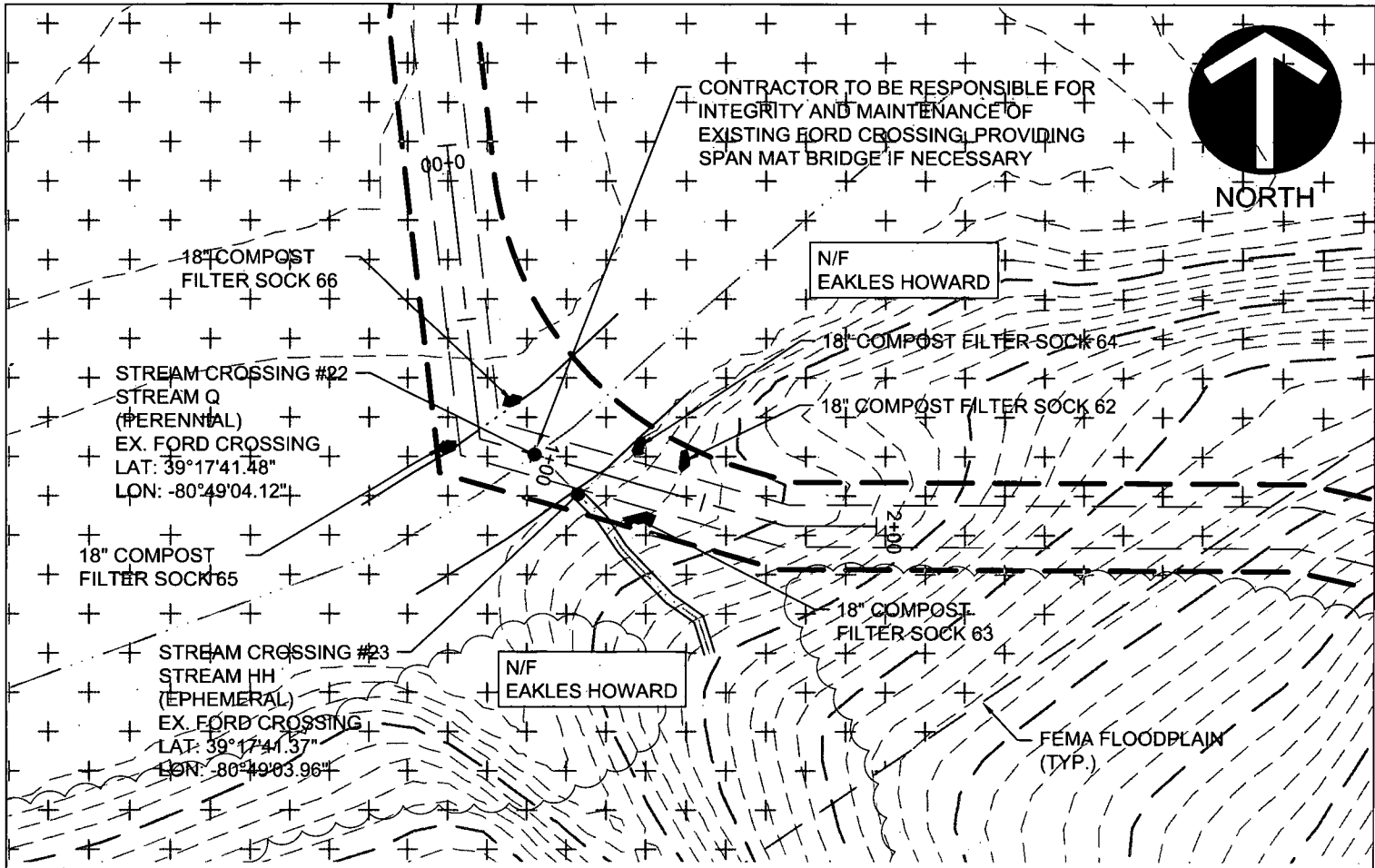
Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



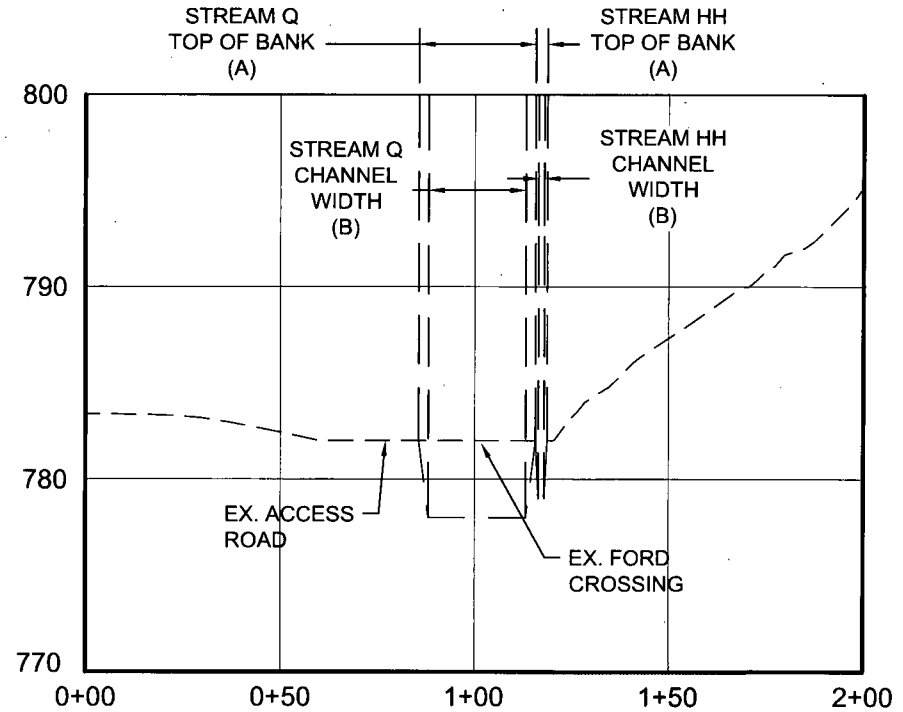
The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



CONTRACTOR TO BE RESPONSIBLE FOR INTEGRITY AND MAINTENANCE OF EXISTING FORD CROSSING PROVIDING SPAN MAT BRIDGE IF NECESSARY



(IN FEET)
1 inch = 50 ft.



NOTE:
THE PROPOSED PROJECT IS FOR THE INSTALLATION OF A NATURAL GAS PIPELINE. UPON INSTALLATION, THE FLOODPLAIN WILL BE RETURNED TO ITS PRE-CONSTRUCTION CONDITION.

STREAM CROSSING #22
PLAN AND PROFILE
Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Index Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-6284

© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map - Impact 9



0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #22</p>	<p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: Arnold Creek</p> <p>FEMA Issued Flood Map: 54017C0115C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: About 791 ft</p> <p>Water Depth: About 9.2 ft (Source: HEC_RA)</p> <p>Elevation: About 781 ft</p> <p>Location (long, lat): (80.817891 W, 39.294905 N)</p> <p>Location (UTM 17N): (515704, 4349518)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: Arnold Creek</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

APPENDIX L

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 10

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 10 of 11

Site/Property Information:		
Legal Description: Residential (Stream Crossing #23)		
Physical Address/911 Address: Parcel Tax ID: 1-7-71		
Decimal Latitude/Longitude: 39.294864 N / 80.817837 W		
DMS Latitude/Longitude: 39° 17' 41.37" N / 80° 49' 03.96" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Residential		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 10 of 11

Property Owner Data:		
Name of Primary Owner (PO): Howard Eakles		
PO Address: 325 Rr. 1		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1566		
PO Secondary Phone: 304-904-9983		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.











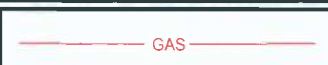












Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Howard Eakles		
PO Address: 325 Rr. 1		
City: West Union	State: WV	Zip: 26456
PO Primary Phone: 304-873-1566		
PO Secondary Phone: 304-904-9983		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Crandall Neely		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): EQM Gathering Opco, LLC		
Physical Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 724-873-3009		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Equitrans, INC.		
Physical Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 724-873-3009		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  90° MINOR  90°	EXISTING CONTOURS
	FEMA FLOODPLAIN
	HISTORICAL GEOTECHNICAL ISSUES
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	08 SH 4 DIVERSION BERM
	07 SH 4 TURNOUT
 PLAN  PROFILE	06 SH 3 TRENCH PLUG
 PLAN  PROFILE	05 SH 3 WATERBAR
	03 SH 2 ROCK CONSTRUCTION ENTRANCE
	02 SH 4 ORANGE CONSTRUCTION FENCE
	04 SH 3 SPAN MAT BRIDGE
	10 SH 2 SILT FENCE
	03 SH 2 COMPOST FILTER SOCK
	11 SH 2 SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: C-18422-0010
 Drawing Scale: N.T.S.
 Date Issued: DEC. 2015
 Index Number:
 Drawn By: J.S.
 Checked By: MEB
 Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

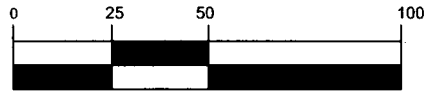
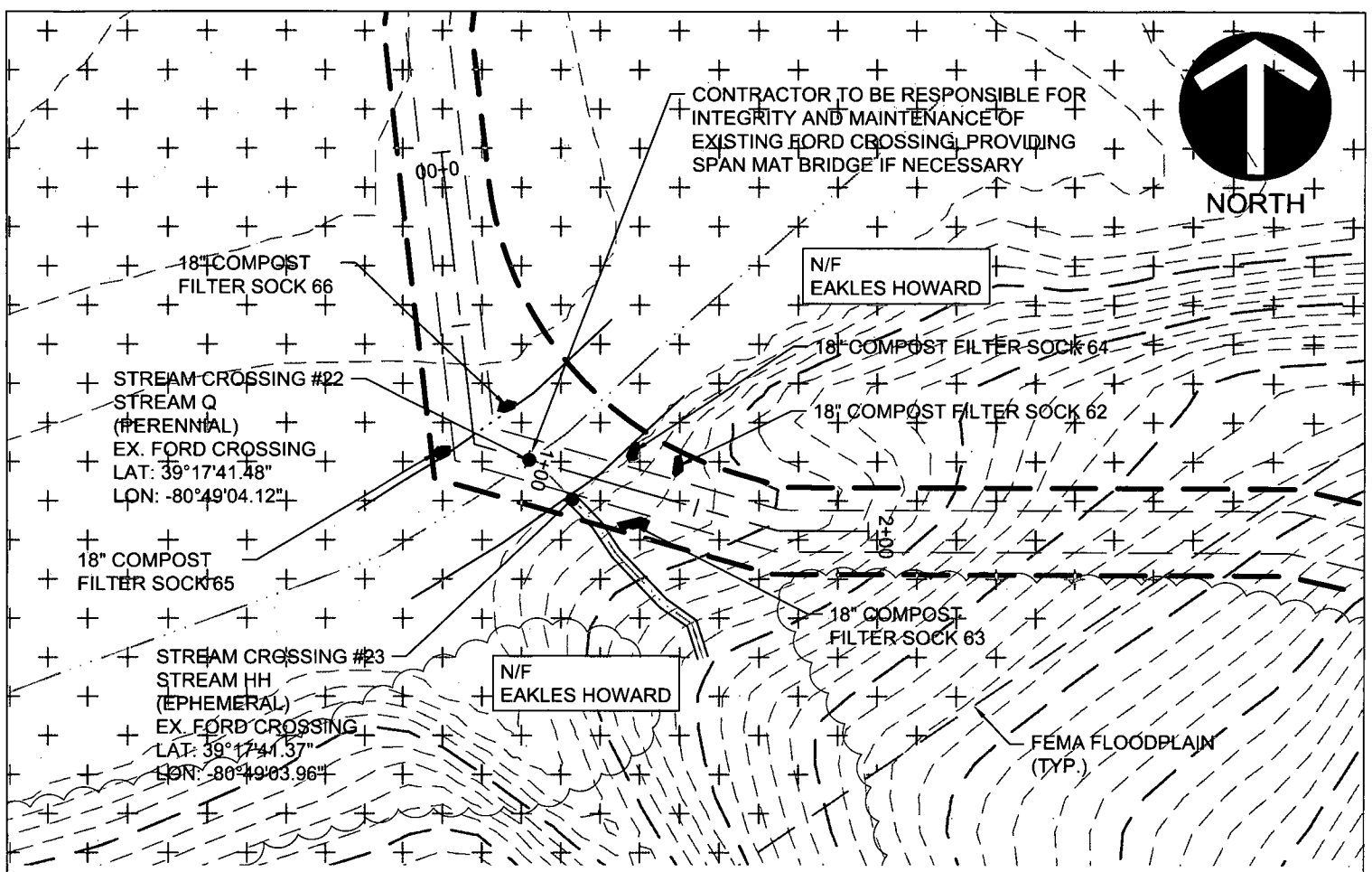
Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



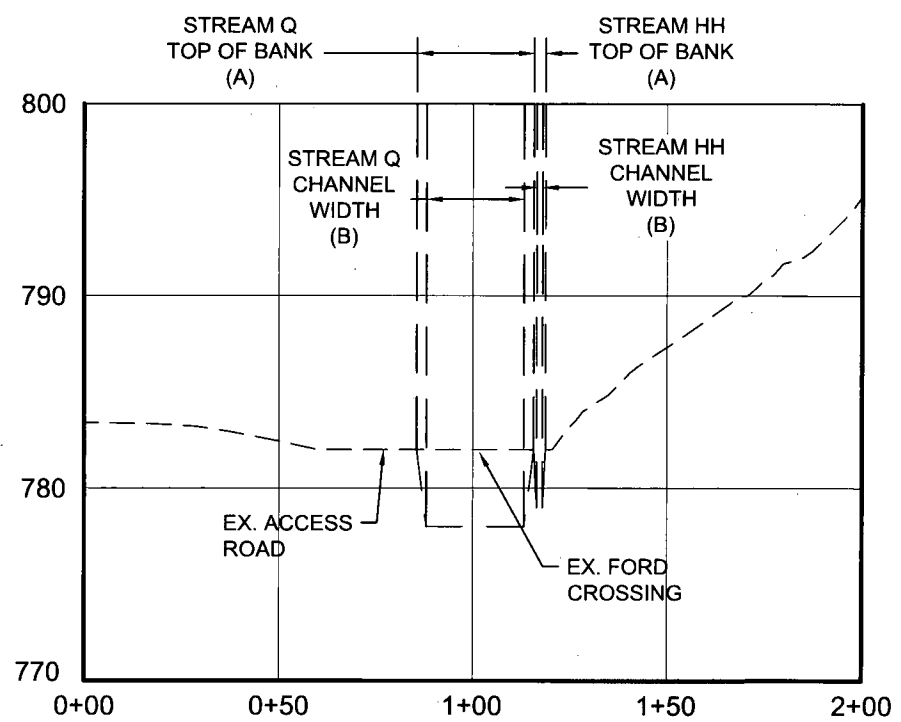
GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



CONTRACTOR TO BE RESPONSIBLE FOR INTEGRITY AND MAINTENANCE OF EXISTING FORD CROSSING PROVIDING SPAN MAT BRIDGE IF NECESSARY



(IN FEET)
1 inch = 50 ft.



NOTE:
THE PROPOSED PROJECT IS FOR THE INSTALLATION OF A NATURAL GAS PIPELINE. UPON INSTALLATION, THE FLOODPLAIN WILL BE RETURNED TO ITS PRE-CONSTRUCTION CONDITION.

STREAM CROSSING #23
PLAN AND PROFILE
Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Index Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB
APPENDIX L

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA
PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

© Gateway Engineers Inc. All Rights Reserved

WV Flood Map - Impact 10



0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #23</p>	<p>Map created on January 7, 2016</p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: Arnold Creek</p> <p>FEMA Issued Flood Map: 54017C0115C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: About 791 ft</p> <p>Water Depth: About 9.7 ft (Source: HEC_RA)</p> <p>Elevation: About 781 ft</p> <p>Location (long, lat): (80.817837 W, 39.294864 N)</p> <p>Location (UTM 17N): (515708, 4349514)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: Arnold Creek</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>			

APPENDIX M

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 11

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 11 of 11

Site/Property Information:		
Legal Description: Vacant Lot (Stream Crossing #12)		
Physical Address/911 Address: 1138 Punkin Center Road, West Union, WV 26456		
Decimal Latitude/Longitude: 39.257615 N / 80.793472 W		
DMS Latitude/Longitude: 39° 15' 27.27" N / 80° 47' 36.25" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Vacant Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 11 of 11

Property Owner Data:		
Name of Primary Owner (PO): EQM Gathering Opco, LLC		
Physical Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 724-873-3009		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

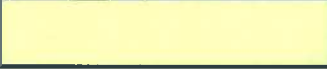










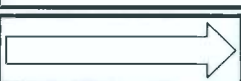











Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Allen G and Diane E. Bennett		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): CNG Transmission Corp		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): EQM Gathering Opco, LLC		
Physical Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 724-873-3009		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): EQM Gathering Opco, LLC		
Physical Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
PO Primary Phone: 724-873-3009		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	HISTORICAL GEOTECHNICAL ISSUES
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	08 SH 4 DIVERSION BERM
	07 SH 4 TURNOUT
 PLAN  PROFILE	06 SH 3 TRENCH PLUG
 PLAN  PROFILE	05 SH 3 WATERBAR
	03 SH 2 ROCK CONSTRUCTION ENTRANCE
	02 SH 4 ORANGE CONSTRUCTION FENCE
	04 SH 3 SPAN MAT BRIDGE
	10 SH 2 SILT FENCE
	03 SH 2 COMPOST FILTER SOCK
	11 SH 2 SUPER SILT FENCE

SITE PLAN LEGEND

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: C-18422-0010
 Drawing Scale: 1" = 5'
 Date Issued: DEC 2015
 Index Number:
 Drawn By: JLS
 Checked By: MEB
 Project Manager: MEB

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

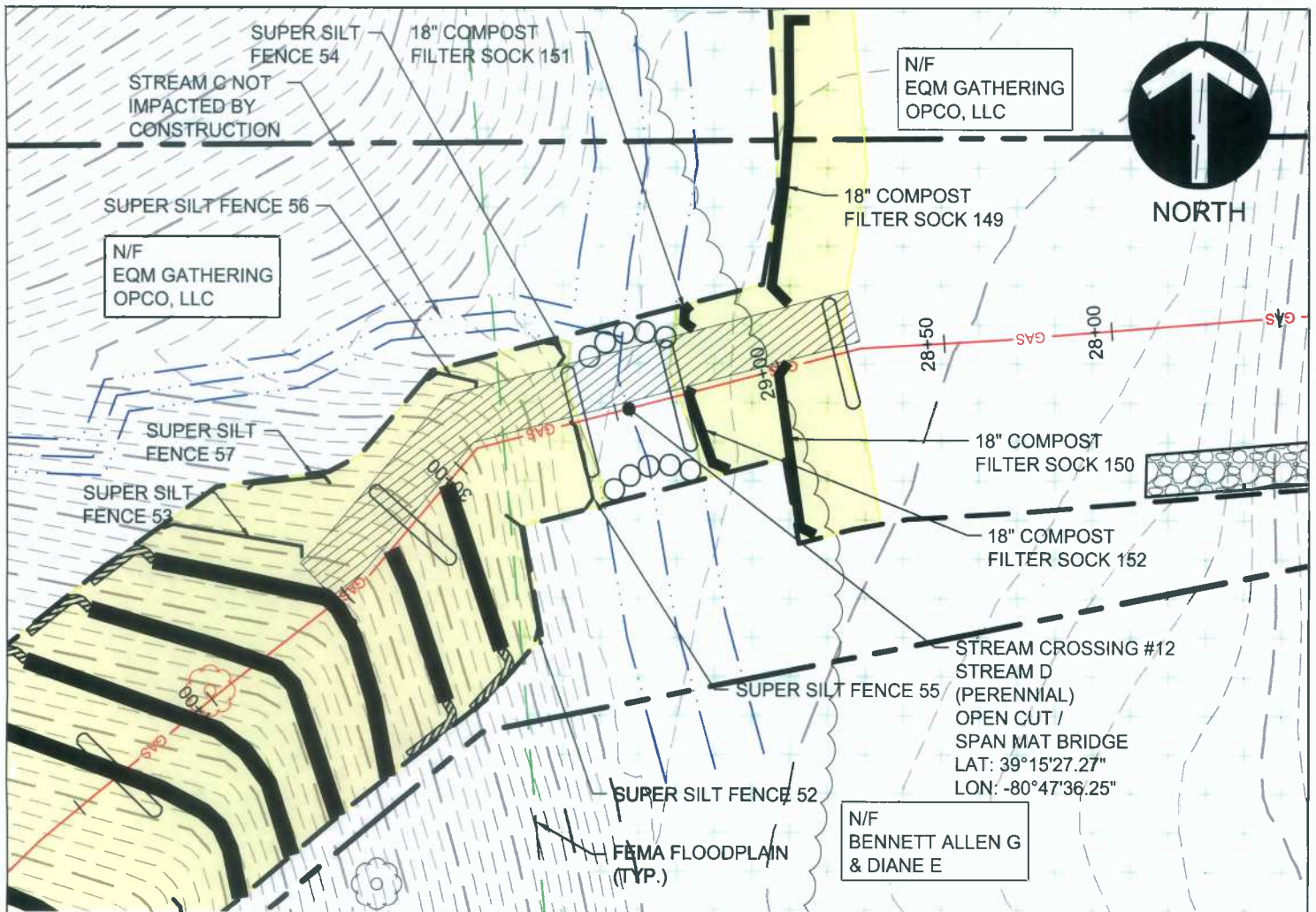
LEGEND

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY®
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved



(IN FEET)
1 inch = 50 ft.

NOTE:
THE PROPOSED PROJECT IS FOR THE INSTALLATION OF A NATURAL GAS PIPELINE. UPON INSTALLATION, THE FLOODPLAIN WILL BE RETURNED TO ITS PRE-CONSTRUCTION CONDITION.

STREAM CROSSING #12
PLAN

Project Number 18422-0012
 Drawing Scale 1"=50'
 Date Issued DEC 2015
 Index Number
 Drawn By JLB
 Checked By JEB
 Project Manager MEB

APPENDIX M

MOSA D003 / MOSA S036 PIPELINE

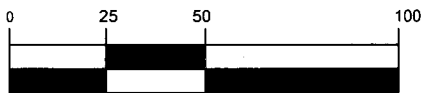
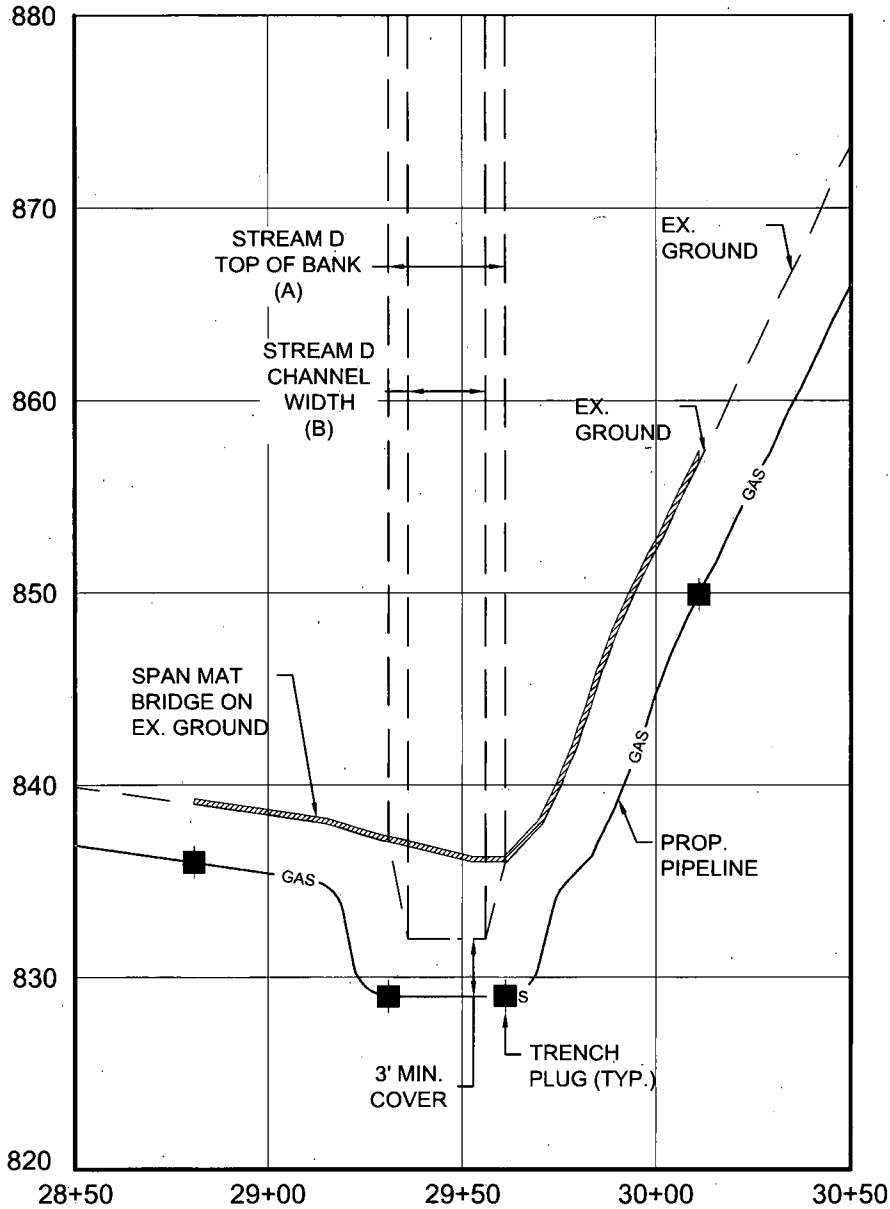
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #12 PROFILE

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: 18422-0012
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Index Number: -
Drawn By: TJS
Checked By: MEB
Project Manager: MEB

APPENDIX M

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY[®]

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA

gatewayengineers.com 855-634-8284

© Gateway Engineers, Inc. All Rights Reserved

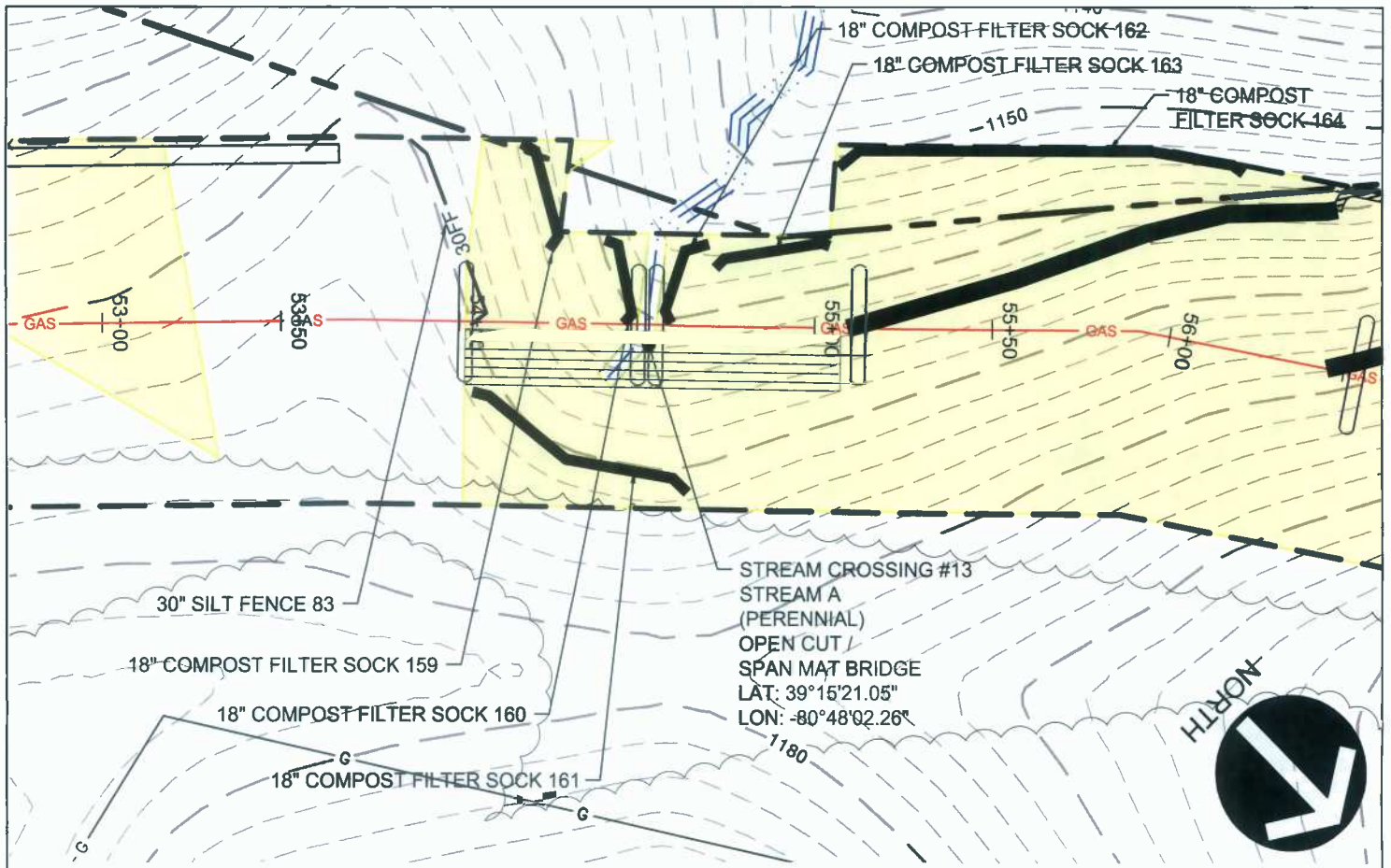
WV Flood Map - Impact 11



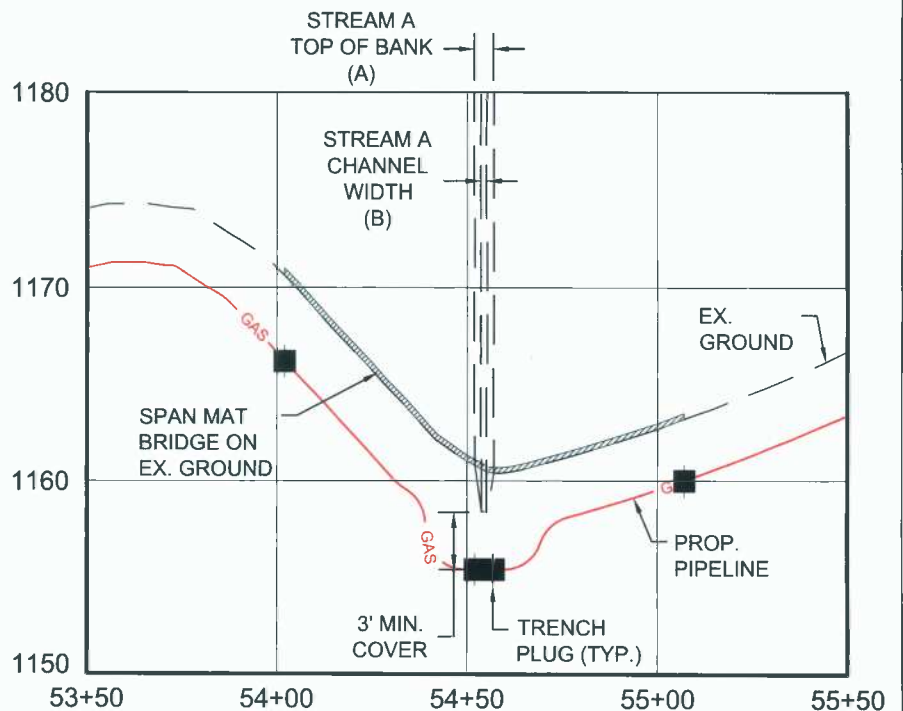
This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #12</p>	<p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: Arnold Creek</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: About 842 ft</p> <p>Water Depth: About 6.0 ft (Source: HEC_RA)</p> <p>Elevation: About 836 ft</p> <p>Location (long, lat): (80.793472 W, 39.257615 N)</p> <p>Location (UTM 17N): (517819, 4345384)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: Arnold Creek</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

APPENDIX N
UNREGULATED FLOODPLAIN IMPACT SITE MAPS



(IN FEET)
 1 inch = 50 ft.



STREAM CROSSING
 #13 PLAN AND
 PROFILE

Project Number 18422-0012
 Drawing Scale 1"=50'
 Date Issued DEC. 2015
 Index Number -
 Drawn By JAS
 Checked By MEB
 Project Manager MEB



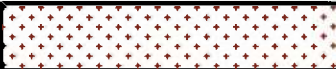






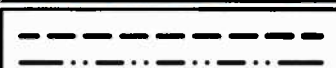

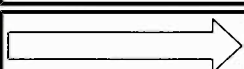
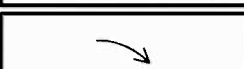






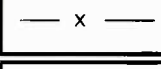


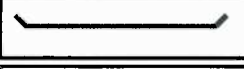
MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	HISTORICAL GEOTECHNICAL ISSUES
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	08 SH 4 DIVERSION BERM
	07 SH 4 TURNOUT
 PLAN  PROFILE	06 SH 3 TRENCH PLUG
 PLAN  PROFILE	05 SH 3 WATERBAR
	03 SH 2 ROCK CONSTRUCTION ENTRANCE
	02 SH 4 ORANGE CONSTRUCTION FENCE
	04 SH 3 SPAN MAT BRIDGE
	10 SH 2 SILT FENCE
	03 SH 2 COMPOST FILTER SOCK
	11 SH 2 SUPER SILT FENCE

SITE PLAN LEGEND

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: C-18422-0010
Drawing Scale: N.T.S.
Date Issued: DEC. 2015
Inisor Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB

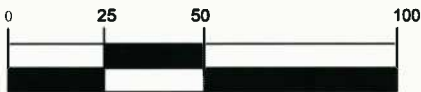
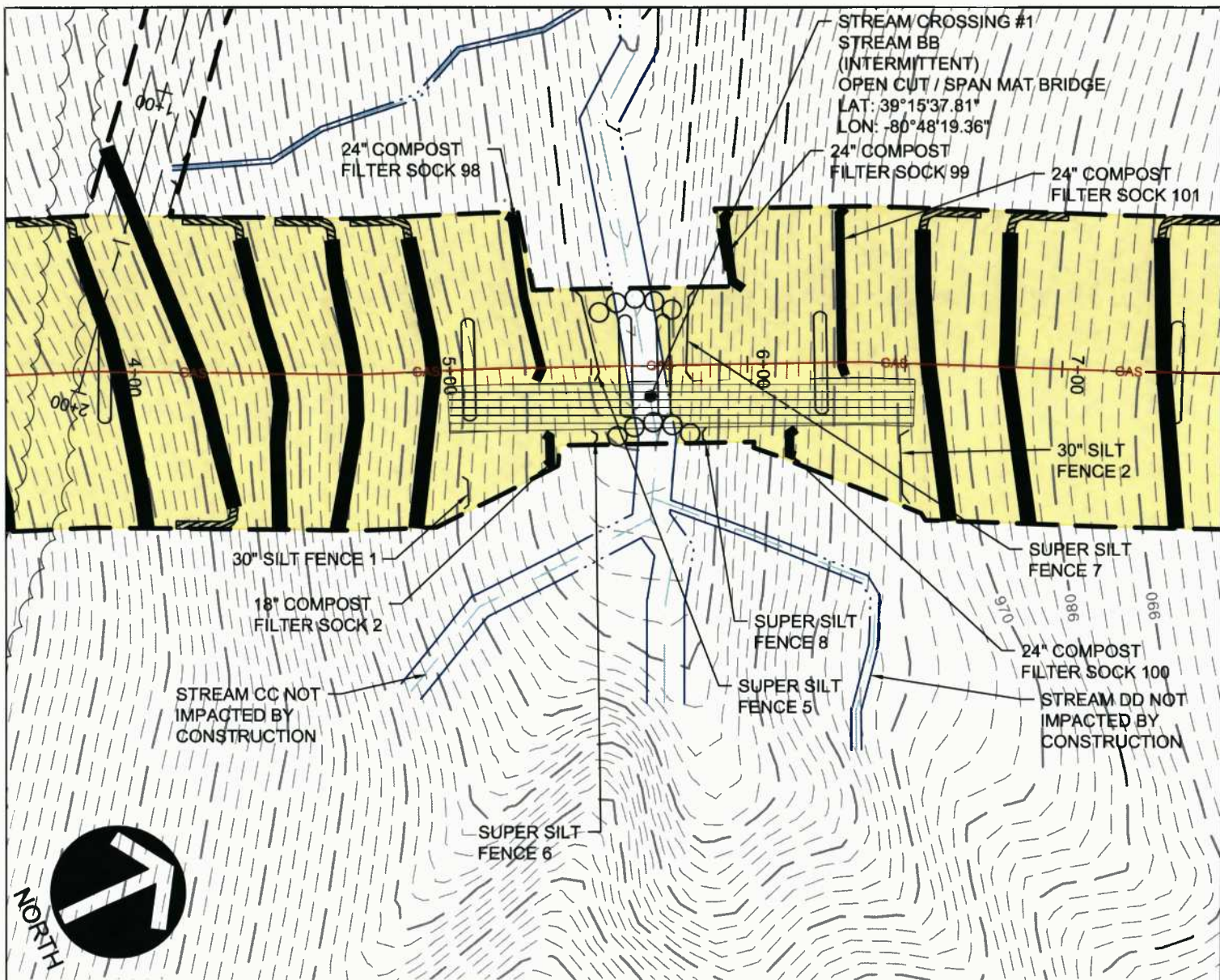
PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

LEGEND

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #1
PLAN
Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC 2016
Inpsa Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB

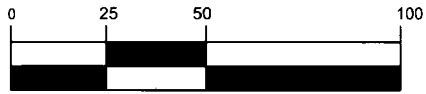
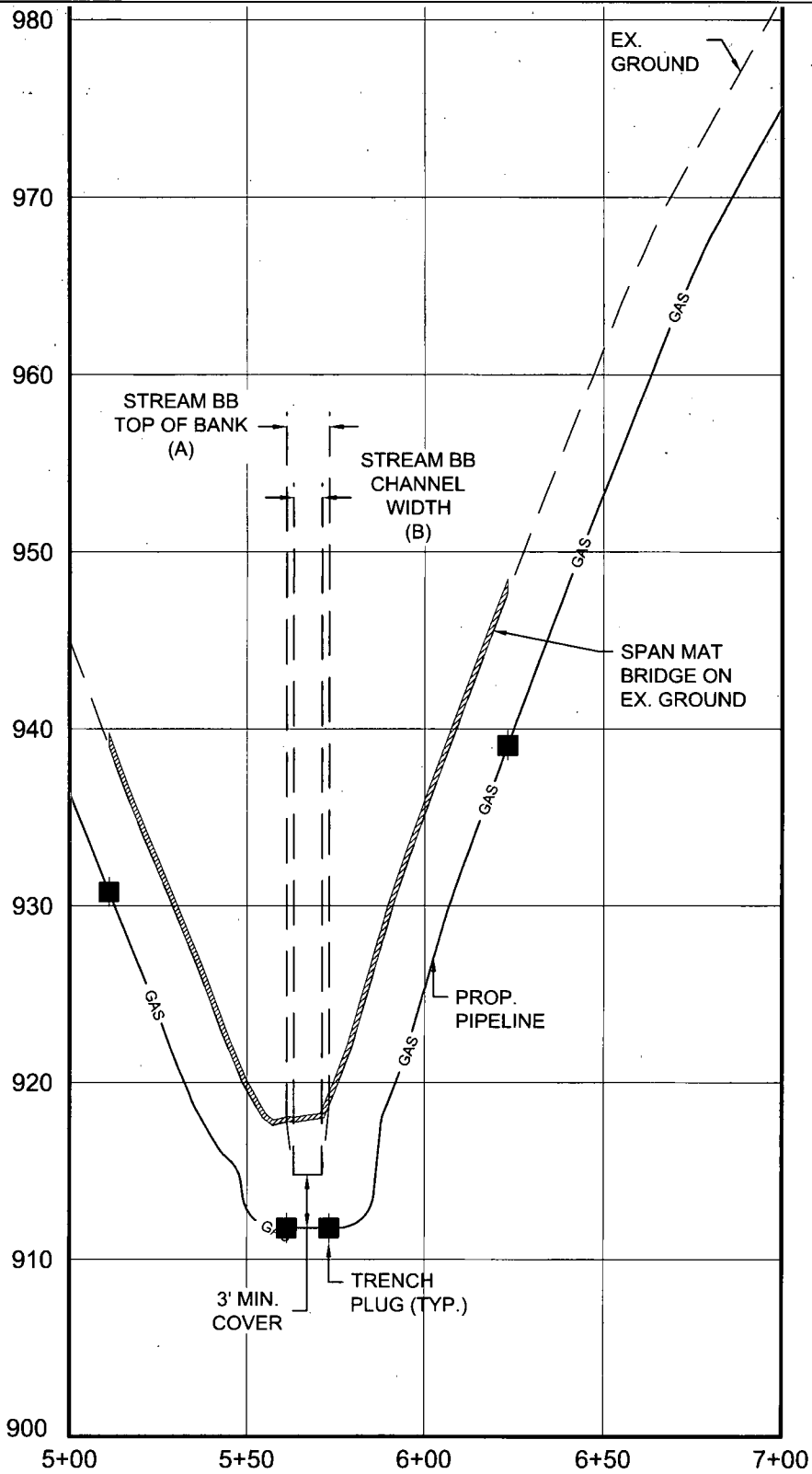
MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	



GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING
#1 PROFILE

Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Drawn By: JJS
Checked By: MEB
Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA

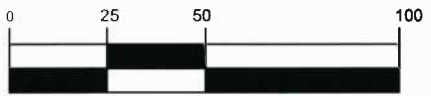
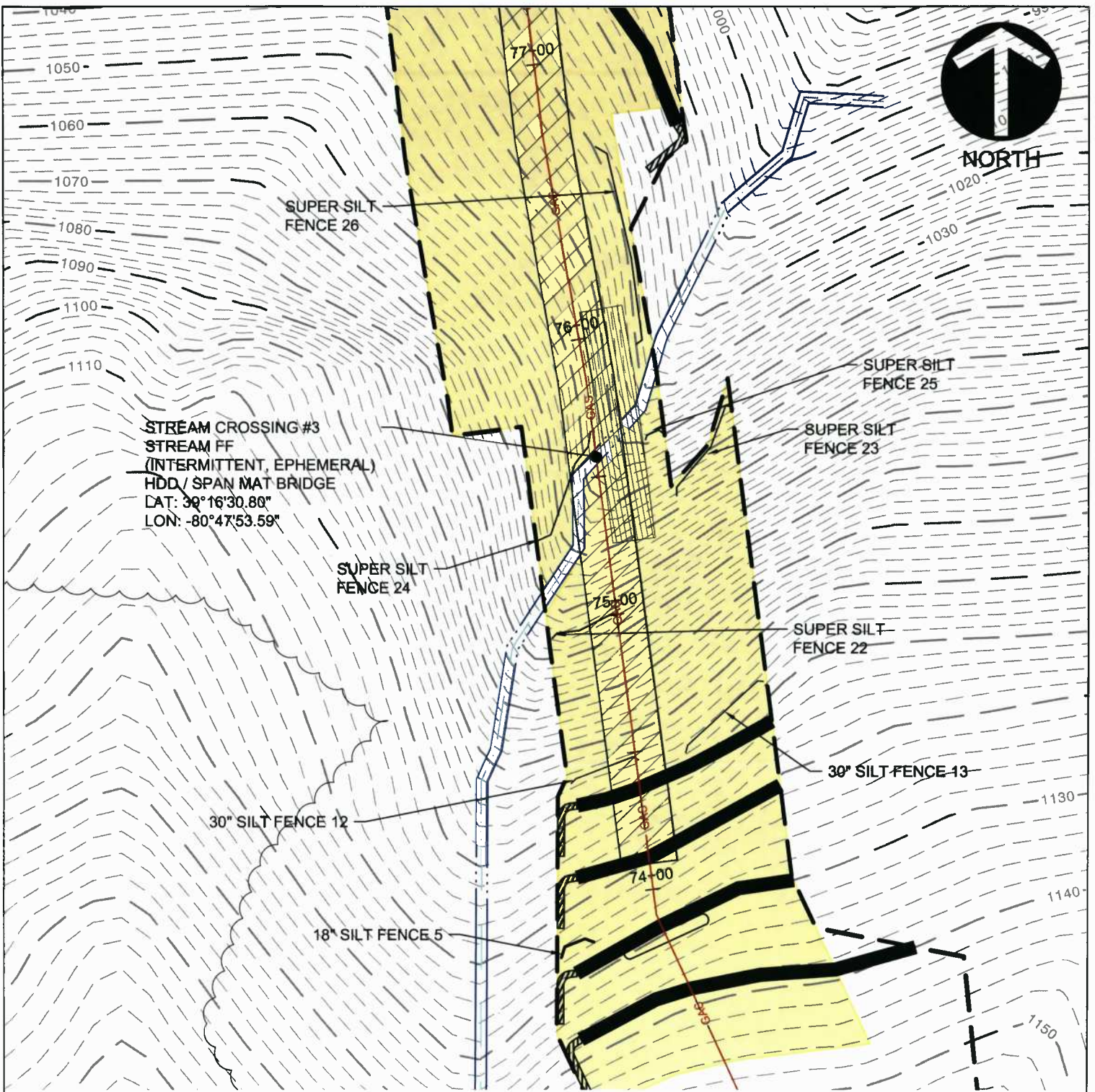
gatewayengineers.com 855-634-9284

WV Flood Map - Non-Impact 1



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #1</p> <p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 915 ft</p> <p>Location (long, lat): (80.805453 W, 39.260548 N)</p> <p>Location (UTM 17N): (516785, 4345708)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	---



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #3 PLAN
Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC 2015
Index Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB
APPENDIX N

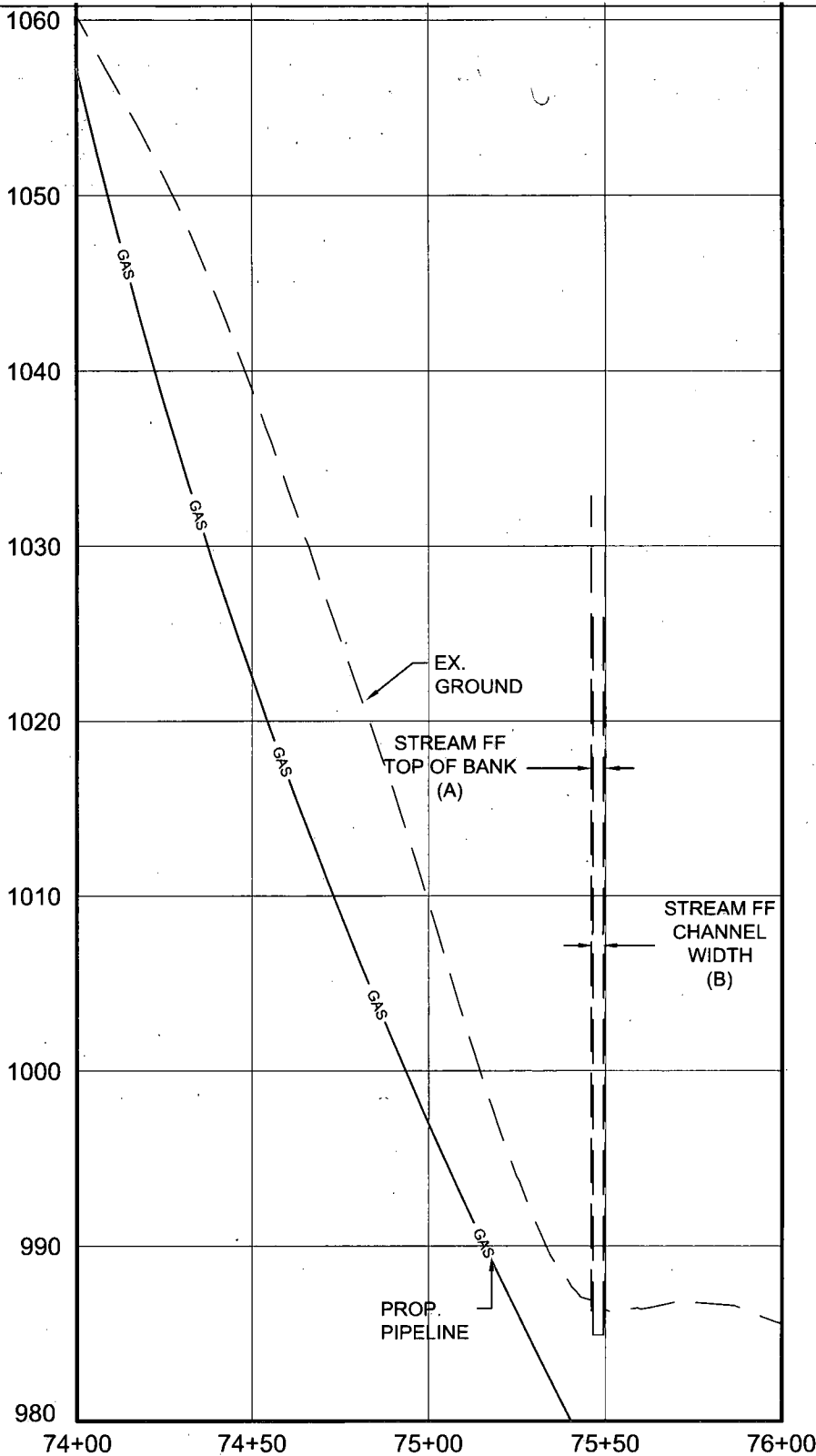
MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #3
PROFILE

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Index Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB

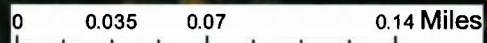
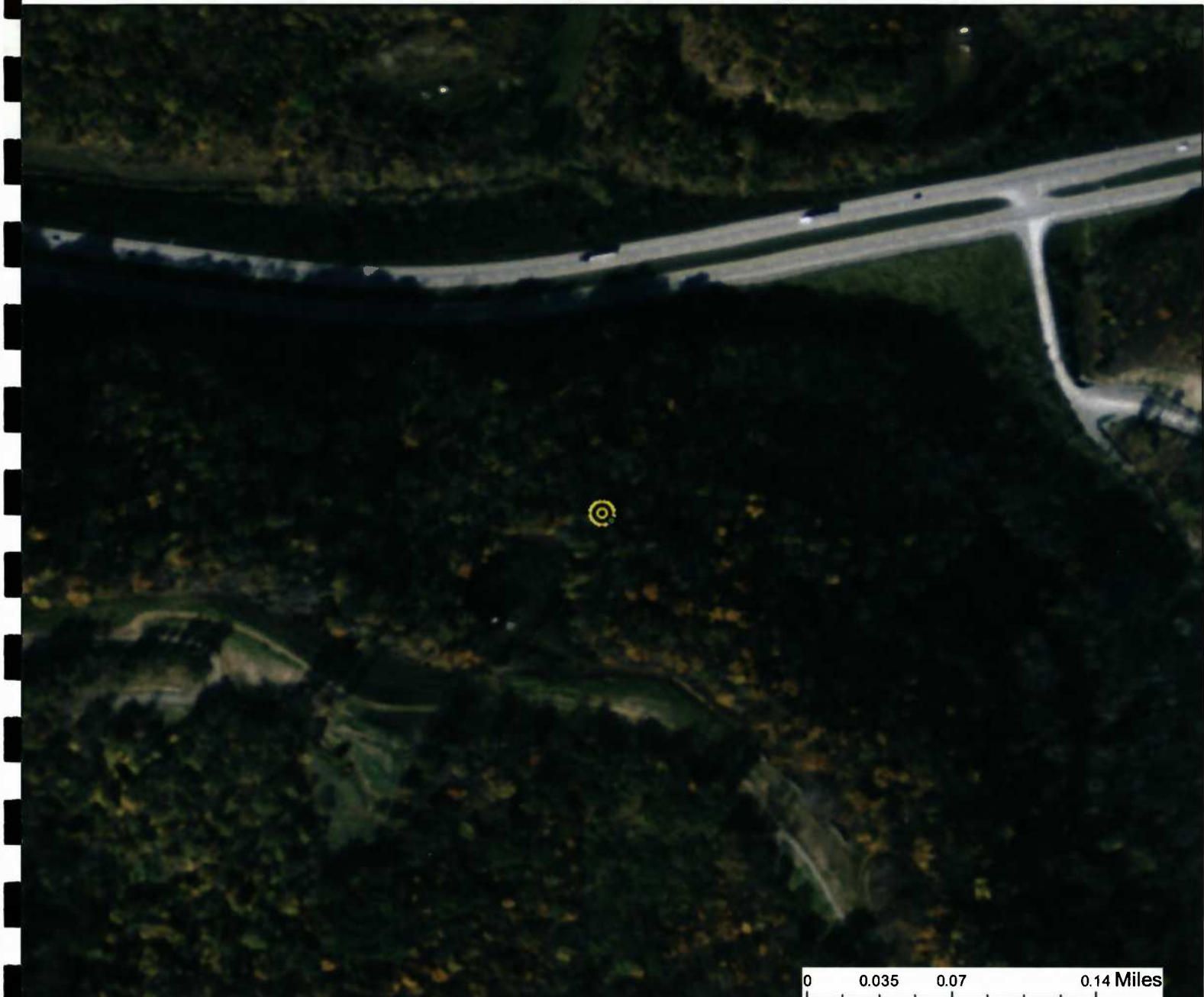
PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

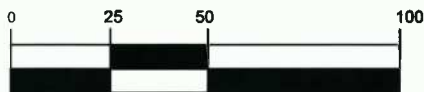
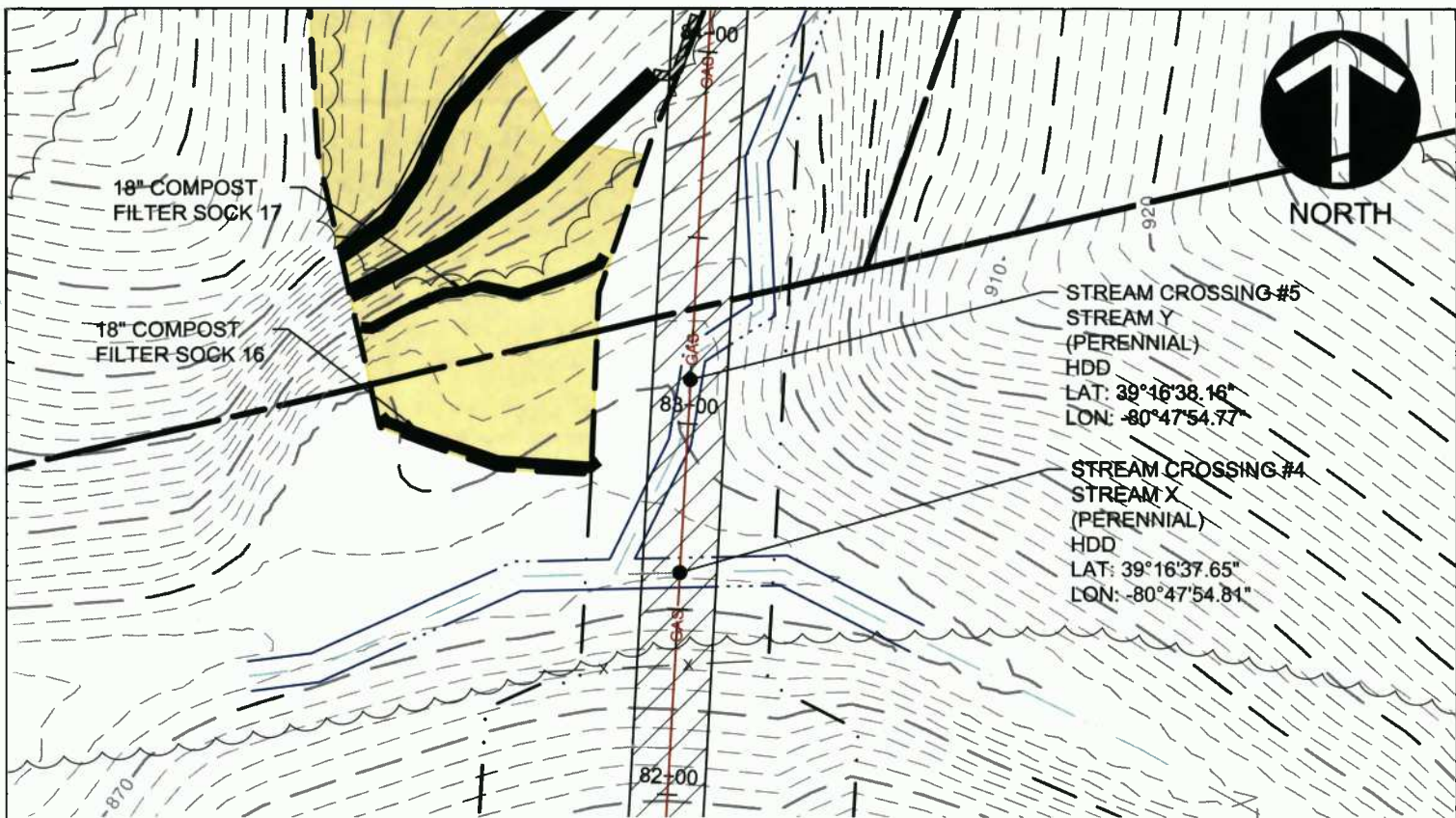
APPENDIX N

WV Flood Map - Non-Impact 2

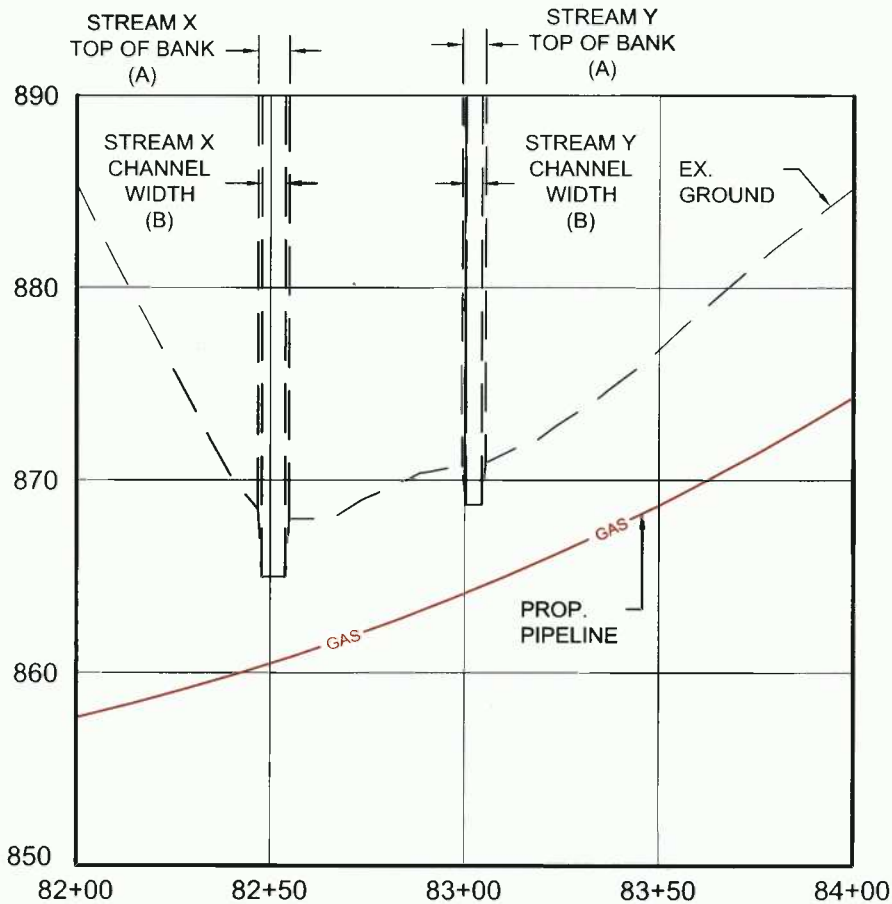


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes:</p> <p>Stream Crossing #3</p>	<p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1062 ft</p> <p>Location (long, lat): (80.798297 W, 39.275275 N)</p> <p>Location (UTM 17N): (517398, 4347343)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer:</p> <p>The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



(IN FEET)
 1 inch = 50 ft.



STREAM CROSSINGS #4
 AND #5 PLAN AND
 PROFILE

Project Number: C-18422-0010
 Drawing Scale: 1"=50'
 Date Issued: DEC. 2015
 Index Number:
 Drawn By: TJS
 Checked By: MEB
 Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA

gatewayengineers.com 855-634-9284








WV Flood Map - Non-Impact 3



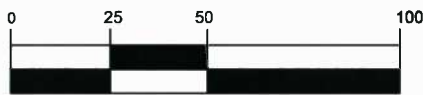
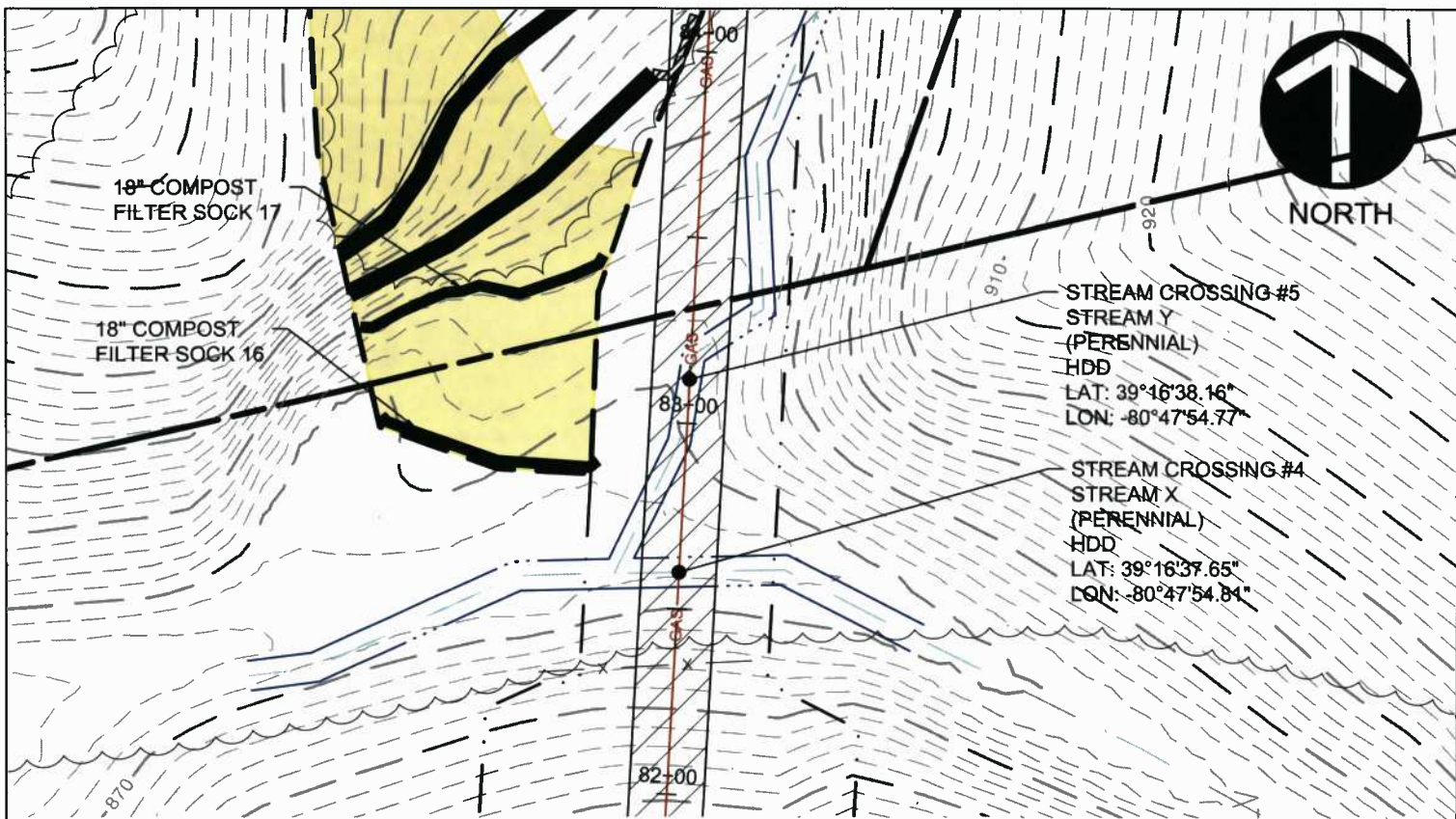
0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

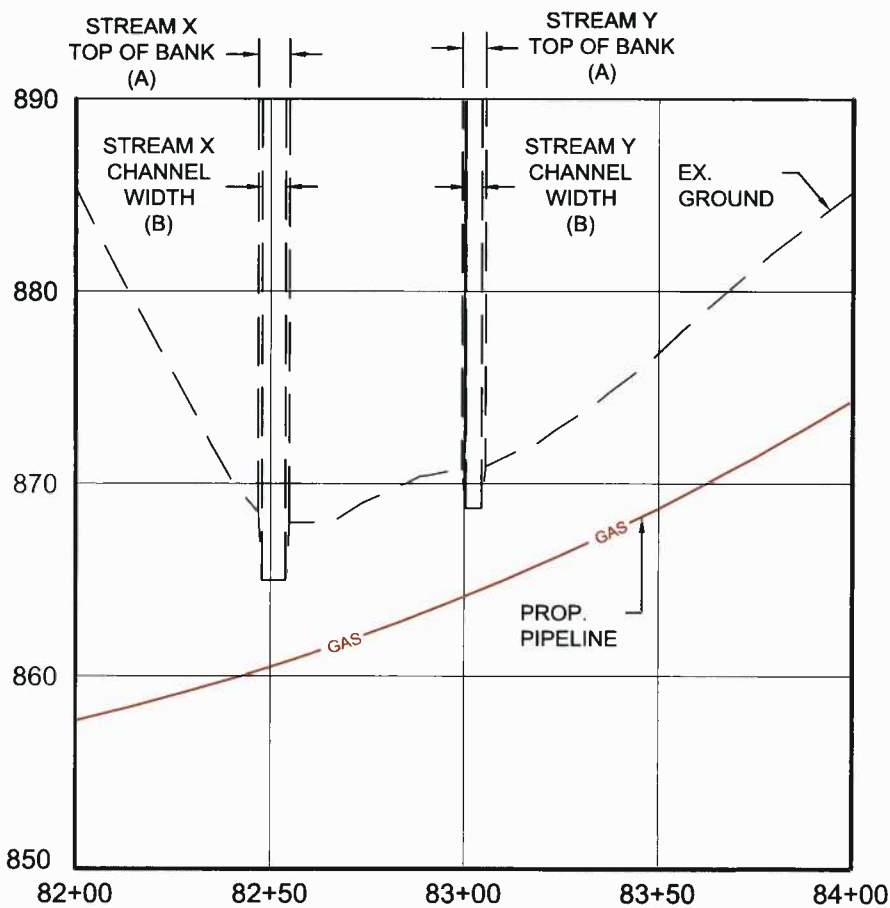
Map created on January 7, 2016

	Cross Section (XS) Lines		Location of flood information
	Base Flood Elevation (BFE) Lines	User Notes:	
	Floodway		Stream Crossing #4
Flood Hazard Zone			
	Approximate Study (Zone A)		
	Detailed Study (AE, AH, AO)		
	Community Rating System Areas		
Disclaimer:			
The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov . WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.			

Flood Hazard Area:	
Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard	
Flood Hazard Zone:	N/A
Stream:	N/A
FEMA Issued Flood Map:	54017C0120C
Watershed (HUC8):	Little Musringum-Middle Island (5030)
Advisory Flood Height:	N/A
Water Depth:	N/A
Elevation:	About 867 ft
Location (long, lat):	(80.798629 W, 39.277152 N)
Location (UTM 17N):	(517369, 4347552)
Contacts:	Doddridge
CRS Information:	N/A
Flood Profile:	N/A
HEC-RAS Model:	N/A
Parcel Number:	



(IN FEET)
1 inch = 50 ft.



STREAM CROSSINGS #4 AND #5 PLAN AND PROFILE

Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Index Number:
Drawn By: J.S.
Checked By: MEB
Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

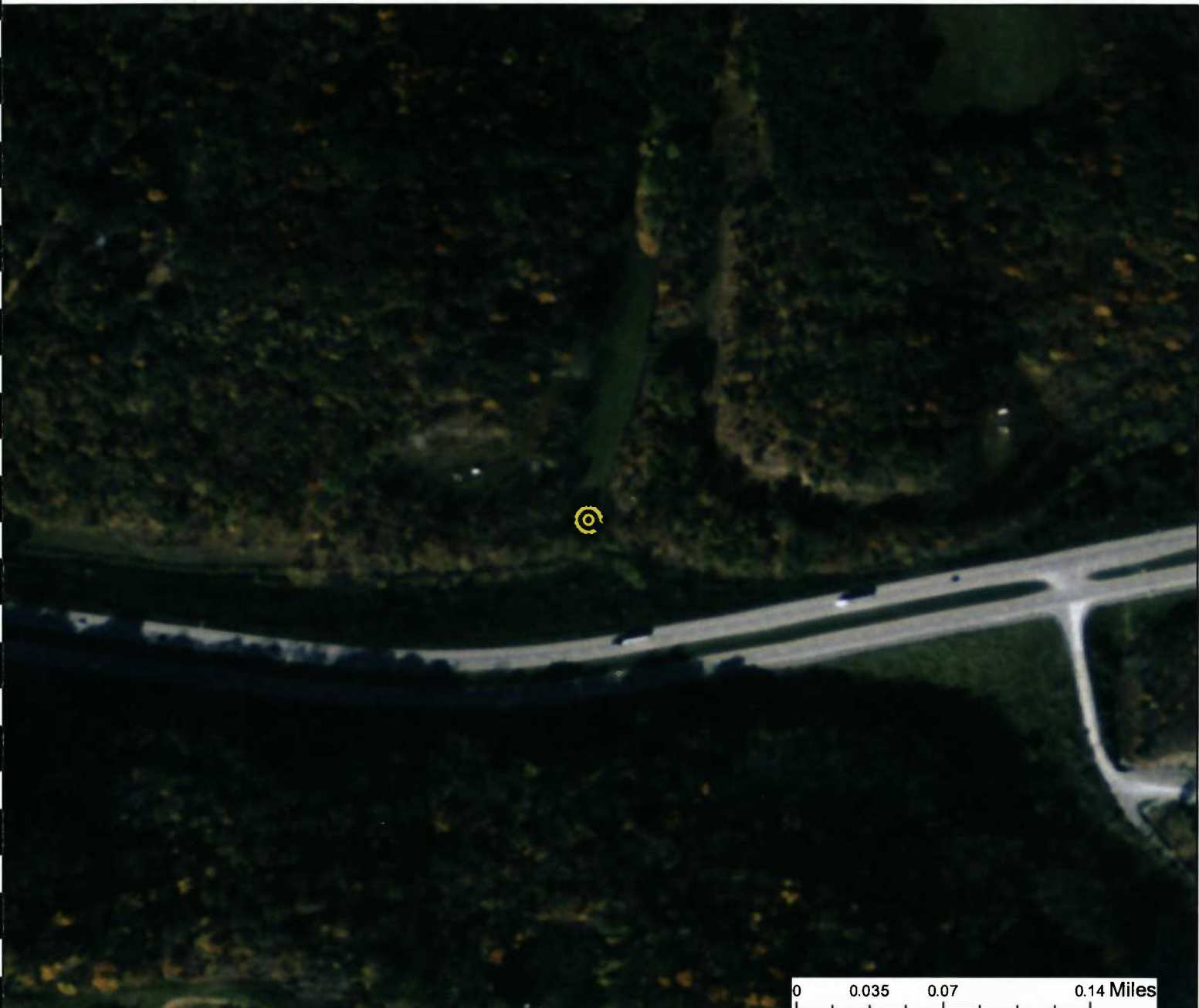
Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA

gatewayengineers.com 855-634-9284

WV Flood Map - Non-Impact 4

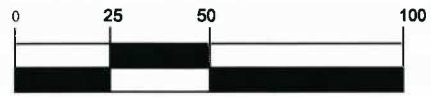
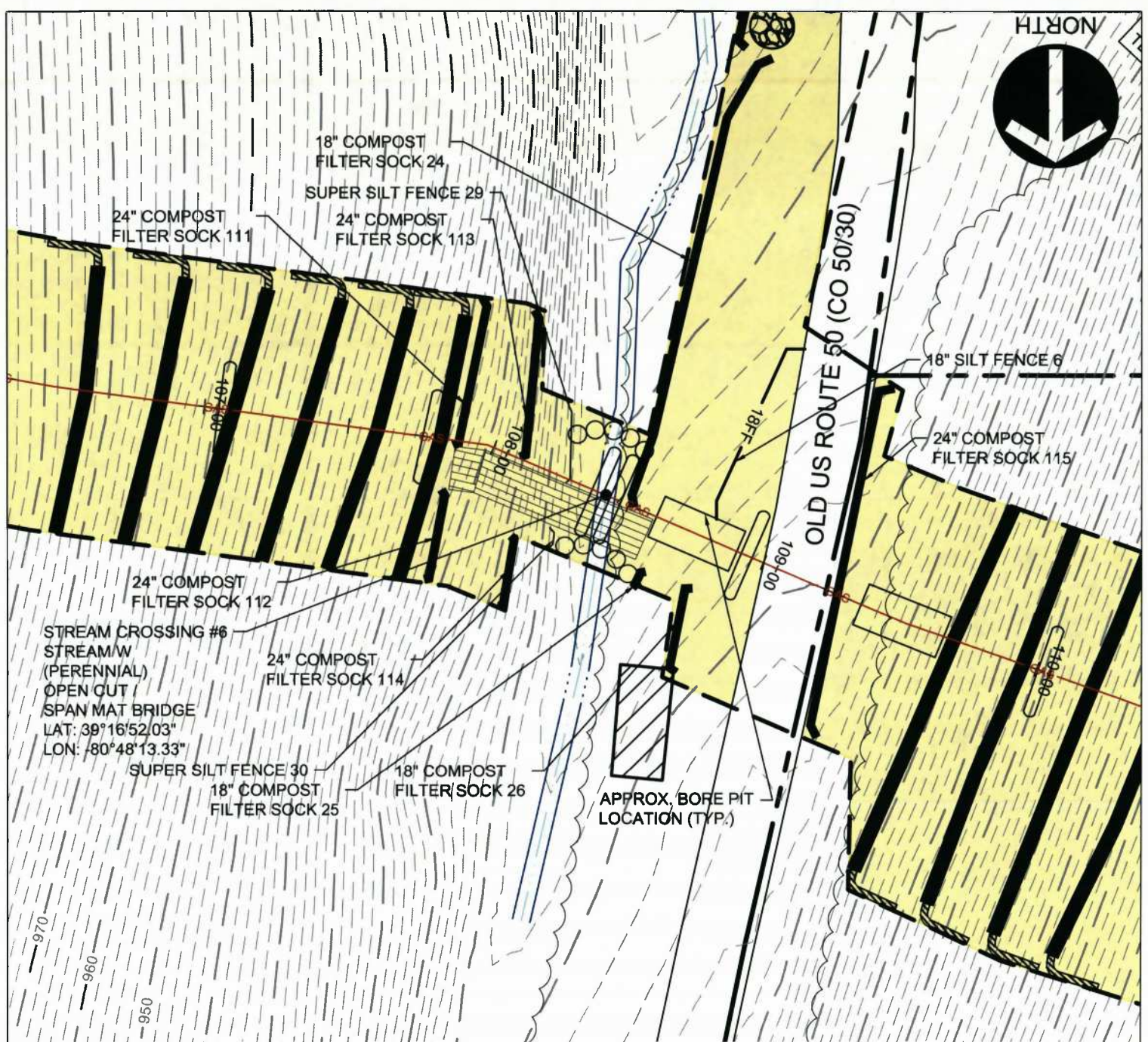


0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #5</p>	<p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 874 ft</p> <p>Location (long, lat): (80.798619 W, 39.277310 N)</p> <p>Location (UTM 17N): (517370, 4347569)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

NORTH



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #6
PLAN
Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Index Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB
APPENDIX N

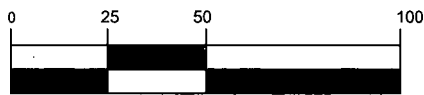
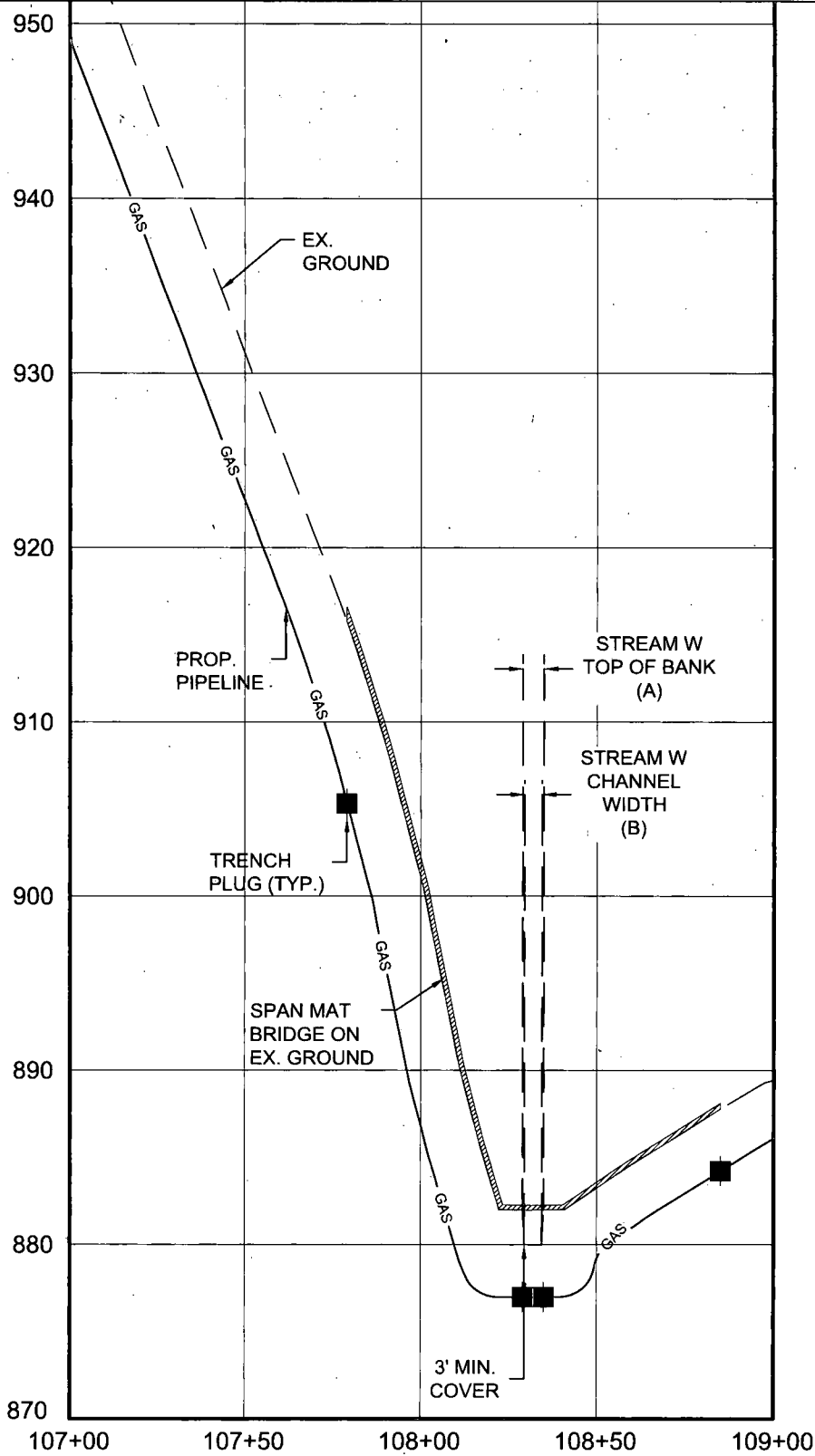
MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA
PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #6
PROFILE
Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEG, 2015
Index Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

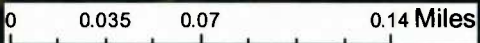
GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map - Non-Impact 5

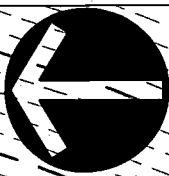


54017C0120C

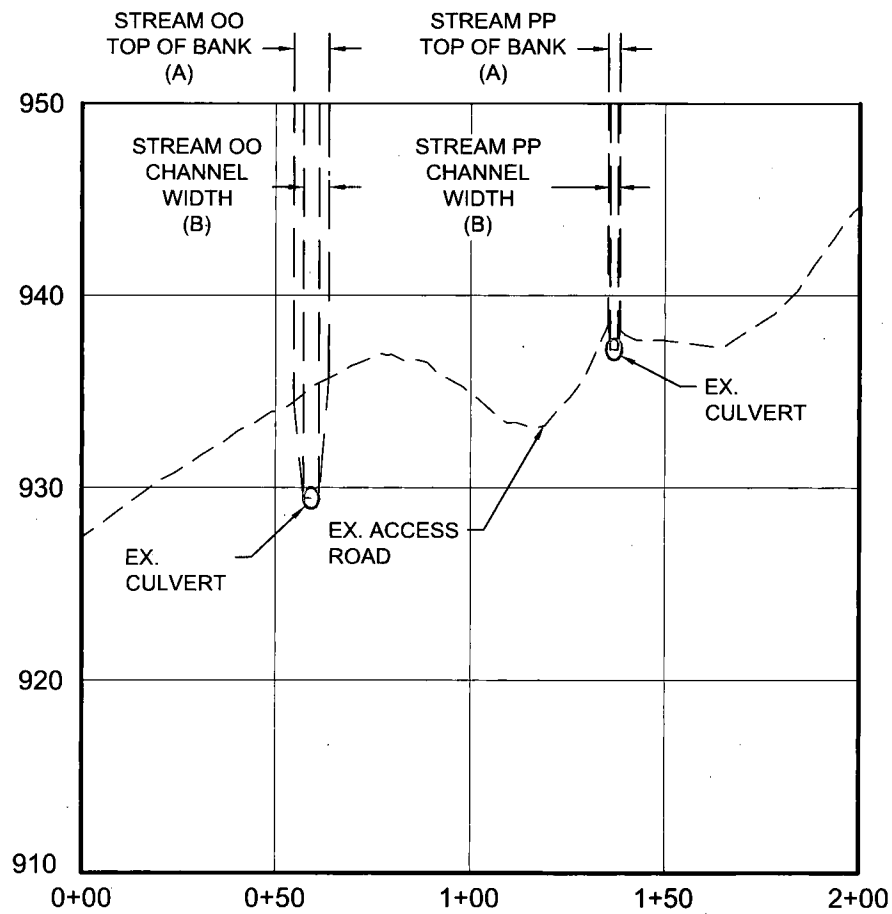
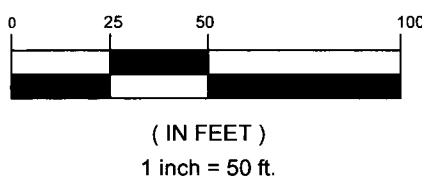
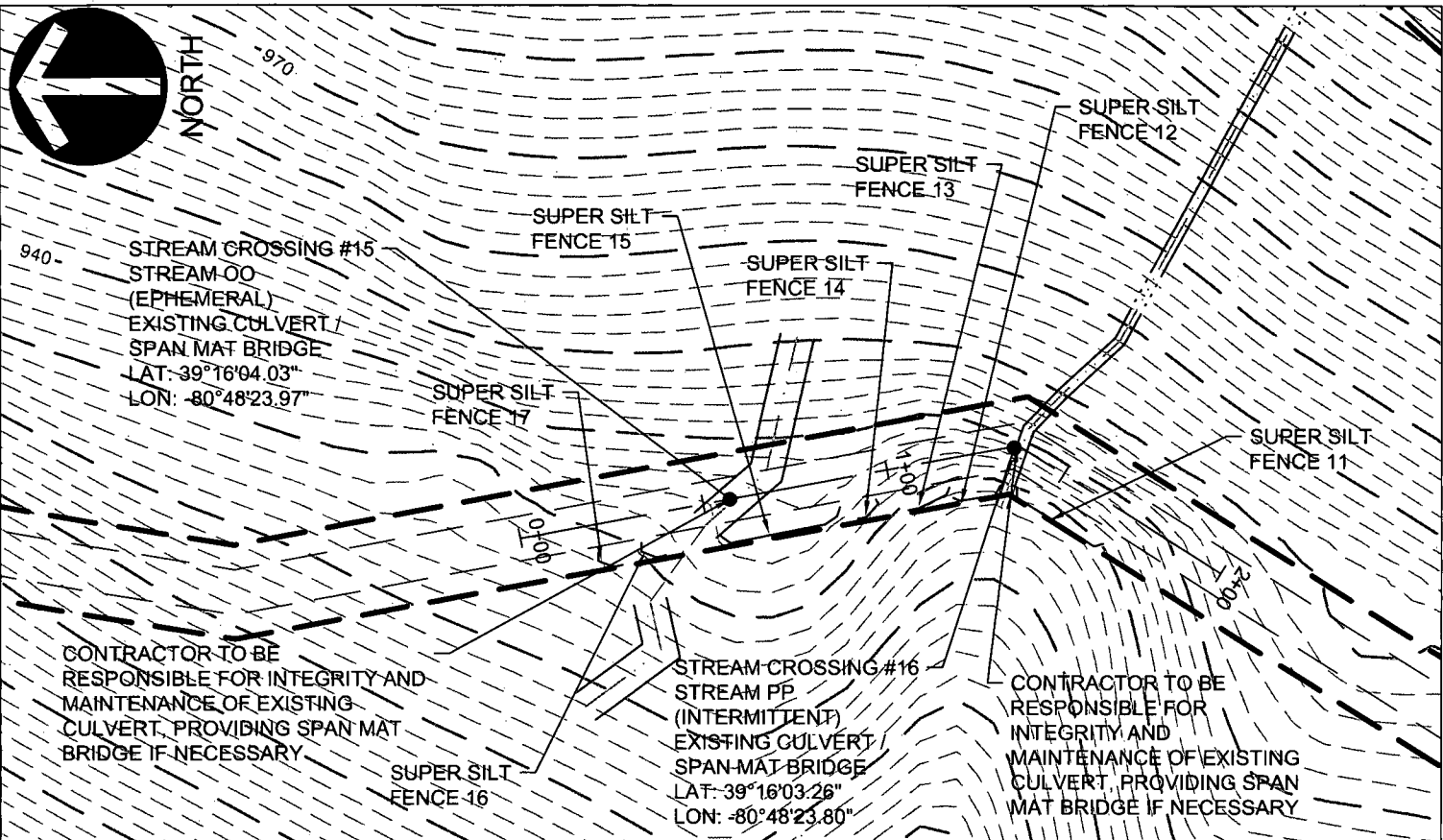


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Location of flood information</p> <p>User Notes: Stream Crossing #6</p>		<p>Map created on January 7, 2016</p>	
<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>	<p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5031)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 884 ft</p> <p>Location (long, lat): (80.803768 W, 39.281164 N)</p> <p>Location (UTM 17N): (516925, 4347996)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>		
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>			



NORTH



STREAM CROSSING #15 AND #16 PLAN AND PROFILE
Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC 2015
Index Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MER

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284








© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map - Non-Impact 6



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

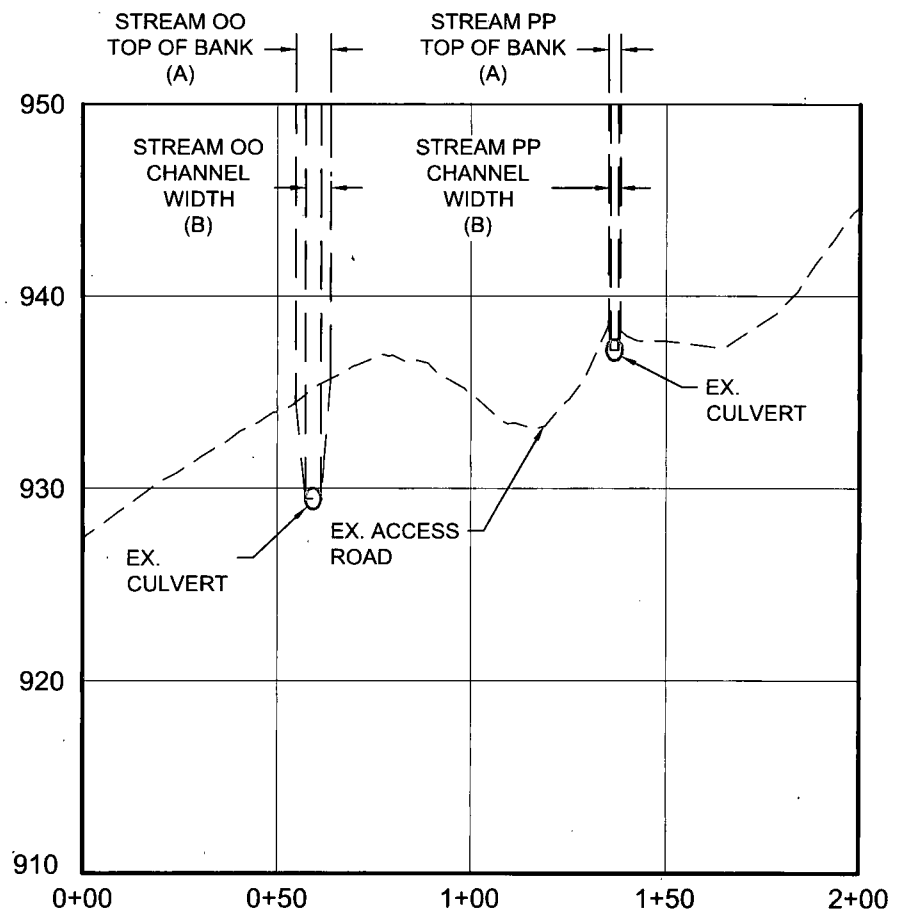
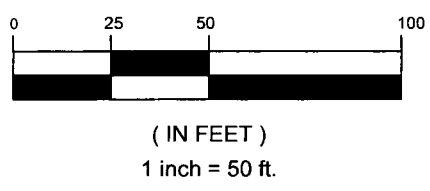
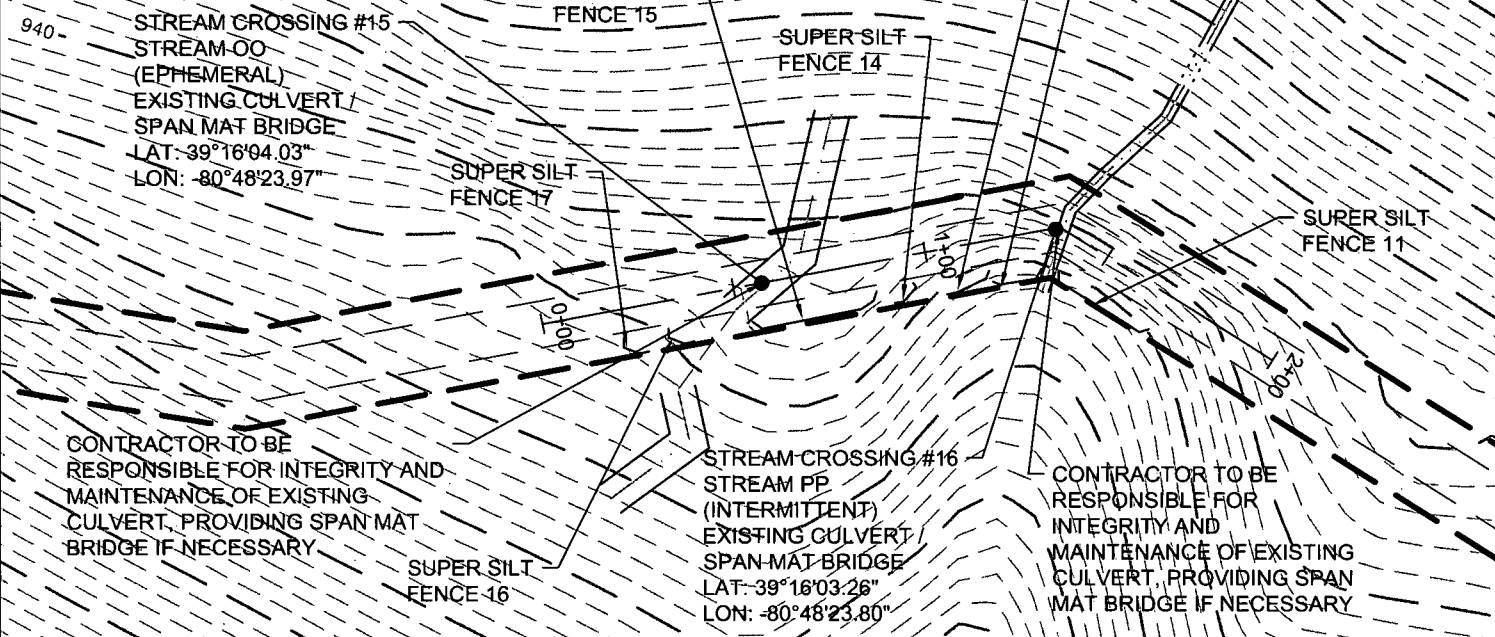
Map created on January 7, 2016

	Cross Section (XS) Lines		Location of flood information
	Base Flood Elevation (BFE) Lines	User Notes:	
	Floodway		Stream Crossing #15
Flood Hazard Zone			
	Approximate Study (Zone A)		
	Detailed Study (AE, AH, AO)		
	Community Rating System Areas		
Disclaimer:			
The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov . WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.			

Flood Hazard Area:	
Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard	
Flood Hazard Zone:	N/A
Stream:	N/A
FEMA Issued Flood Map:	54017C0120C
Watershed (HUC8):	Little Musringum-Middle Island (5030)
Advisory Flood Height:	N/A
Water Depth:	N/A
Elevation:	About 930 ft
Location (long, lat):	(80.806730 W, 39.267833 N)
Location (UTM 17N):	(516673, 4346516)
Contacts:	Doddridge
CRS Information:	N/A
Flood Profile:	N/A
HEC-RAS Model:	N/A
Parcel Number:	



NORTH



STREAM CROSSING #15 AND #16 PLAN AND PROFILE
 Project Number: C-18422-0010
 Drawing Scale: 1"=50'
 Date Issued: DEC. 2015
 Issue Number:
 Drawn By: TJS
 Checked By: MEB
 Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

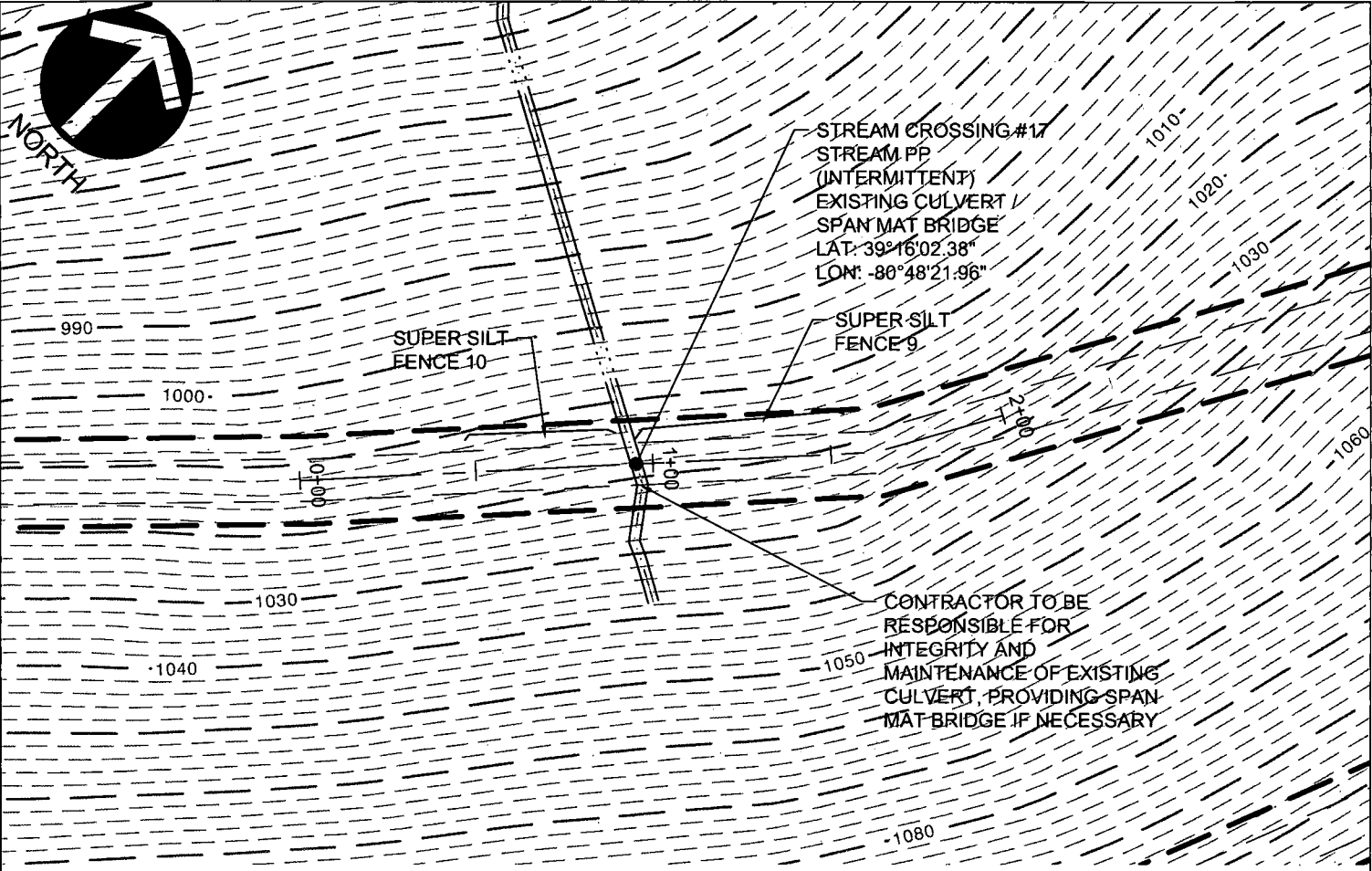
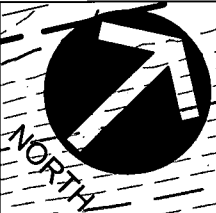
PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

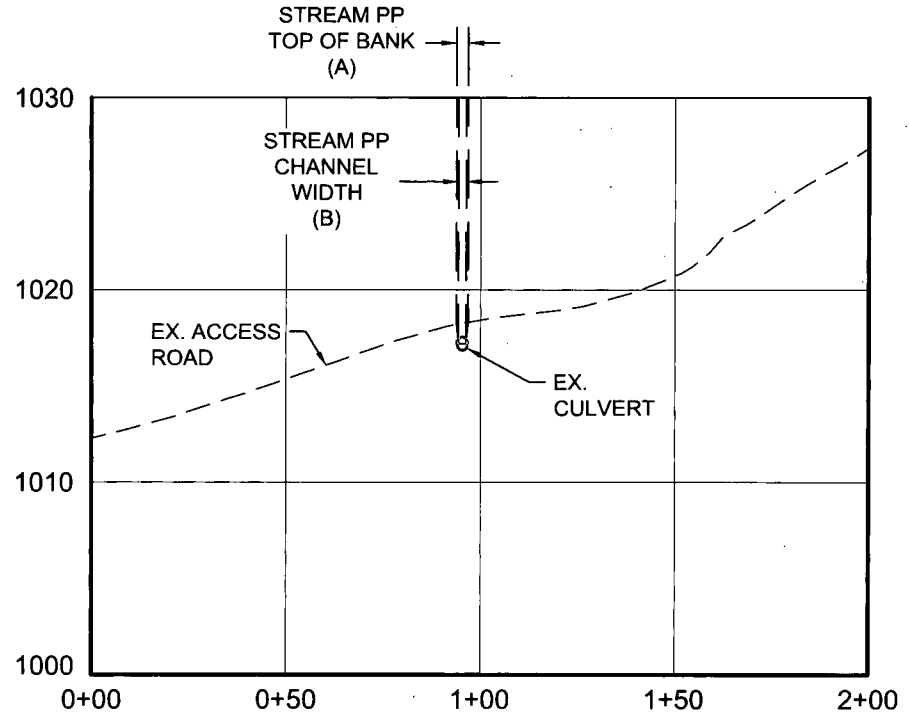
GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved



(IN FEET)
1 inch = 50 ft.



STREAM CROSSING #17 PLAN AND PROFILE
 Project Number: C-18422-0010
 Drawing Scale: 1"=50'
 Date Issued: DEC. 2015
 Inset Number:
 Drawn By: TJS
 Checked By: MEB
 Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

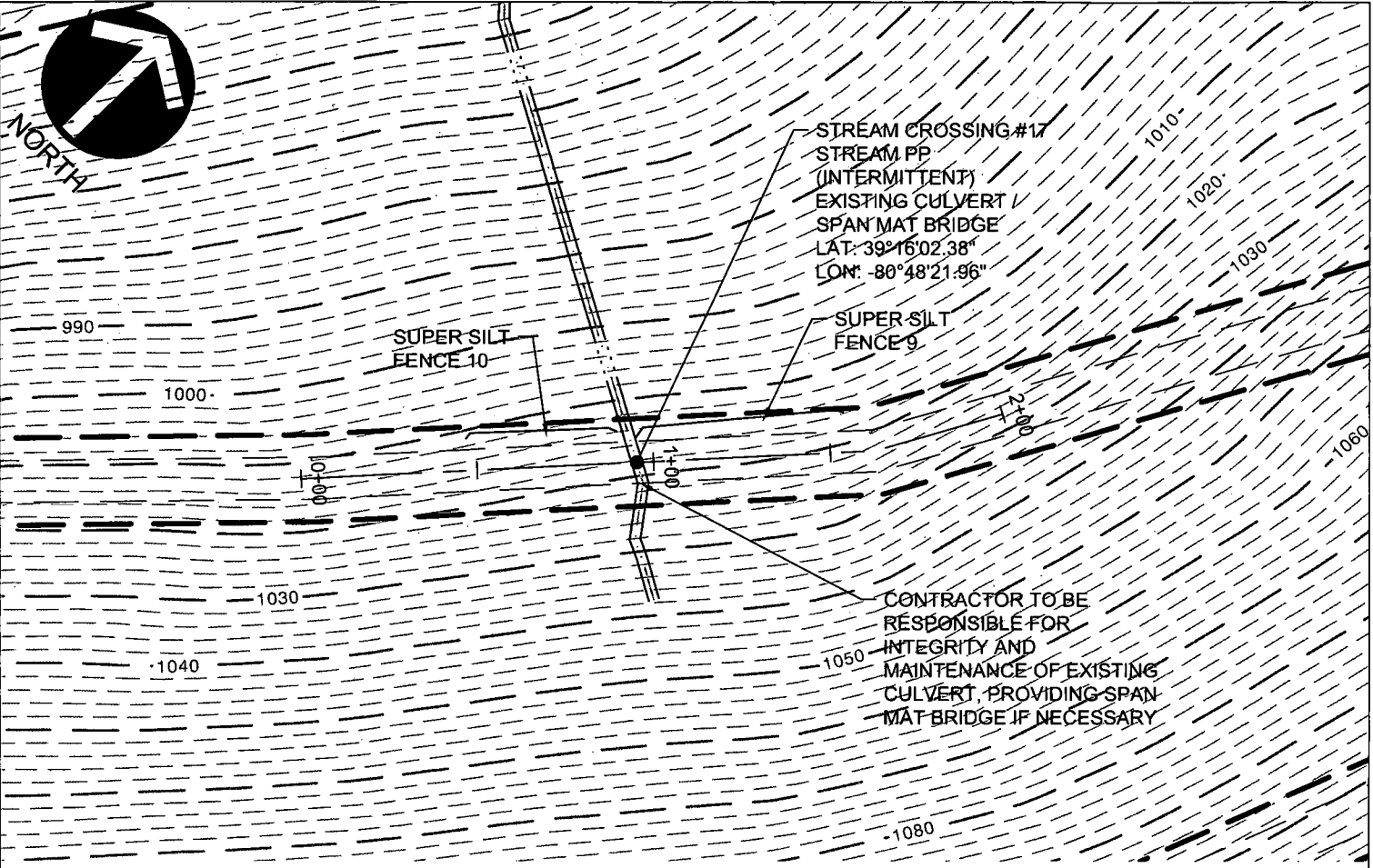
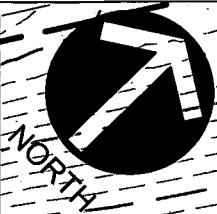
© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map - Non-Impact 7

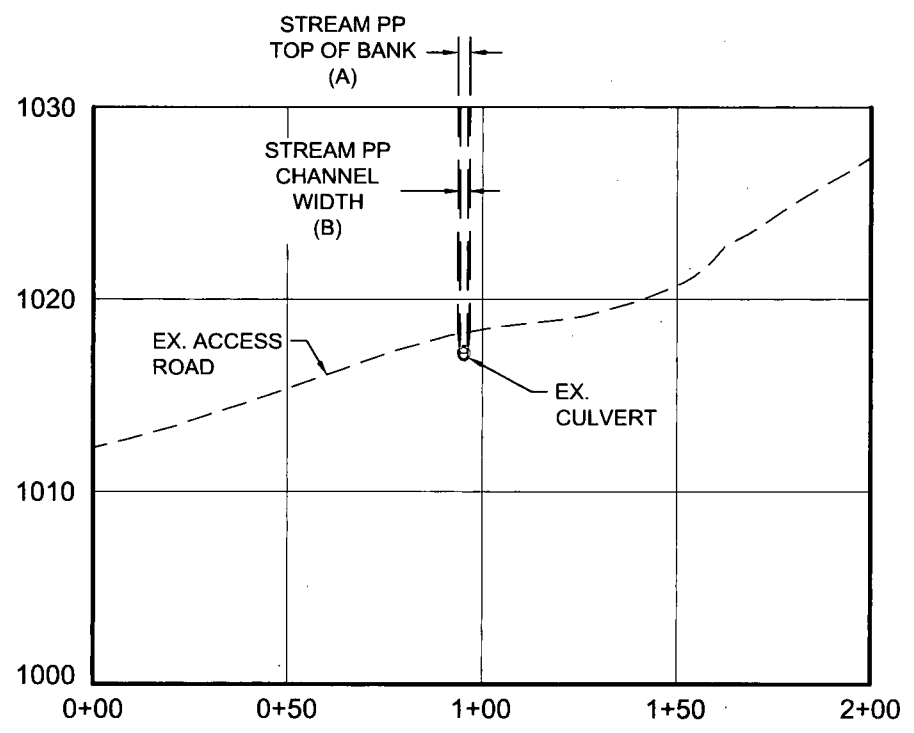


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #16</p>	<p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 923 ft</p> <p>Location (long, lat): (80.806676 W, 39.267609 N)</p> <p>Location (UTM 17N): (516677, 4346491)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



(IN FEET)
1 inch = 50 ft.



STREAM CROSSING #17 PLAN AND PROFILE
 Project Number: C-18422-0010
 Drawing Scale: 1"=50'
 Date Issued: DEC, 2015
 Issue Number:
 Drawn By: TJS
 Checked By: MEB
 Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers Inc. All Rights Reserved

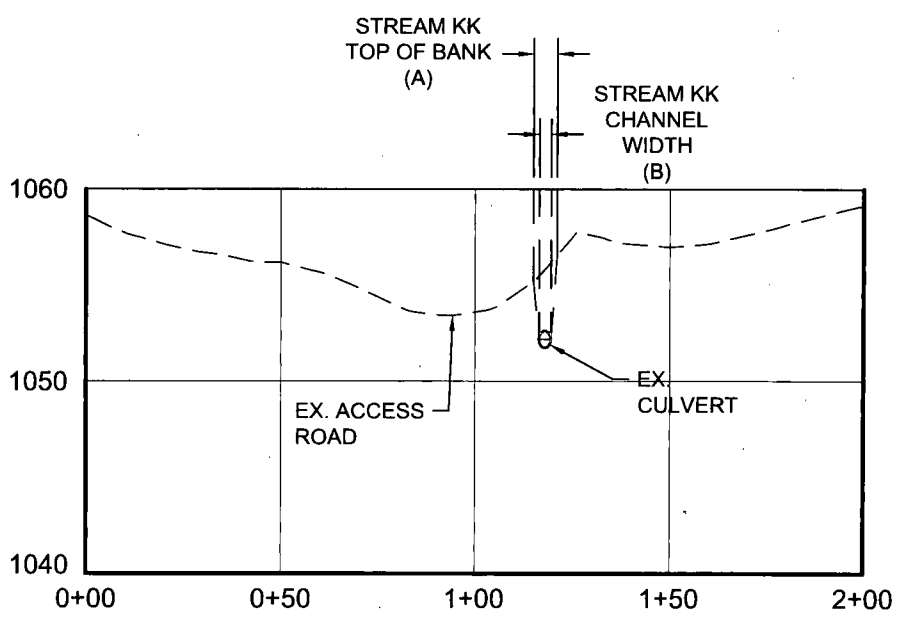
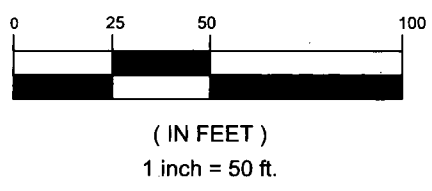
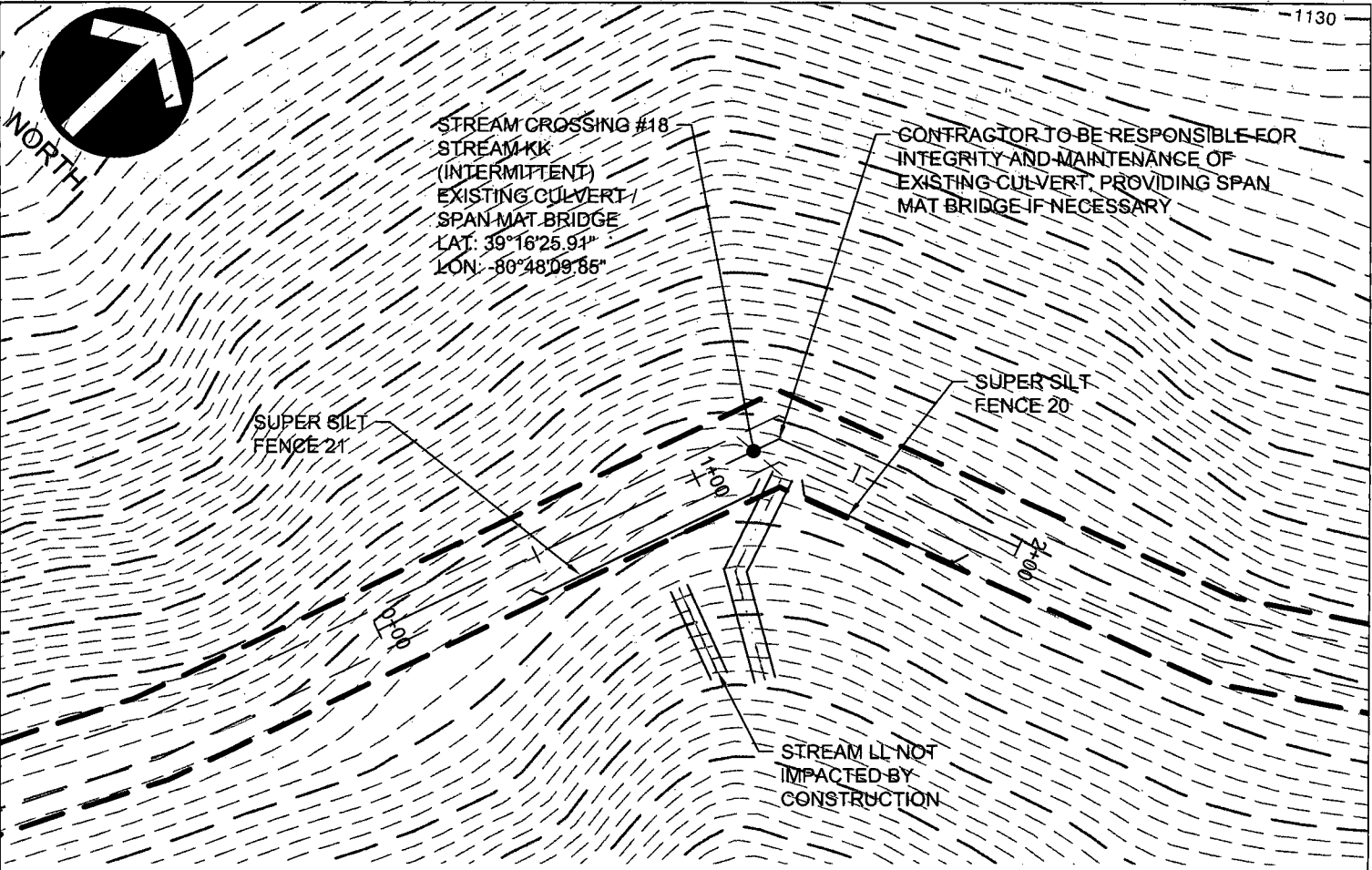
WV Flood Map - Non-Impact 8



0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Location of flood information</p> <p>User Notes: Stream Crossing #17</p>		<p>Map created on January 7, 2016</p>	
<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>	<p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1005 ft</p> <p>Location (long, lat): (80.806172 W, 39.267377 N)</p> <p>Location (UTM 17N): (516721, 4346465)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>		
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



STREAM CROSSING
 #18 PLAN AND PROFILE

Project Number: C-18422-0010
 Drawing Scale: 1"=50'
 Date Issued: DEC, 2015
 Issue Number:
 Drawn By: TJS
 Checked By: MEB
 Project Manager: MEB

APPENDIX N

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

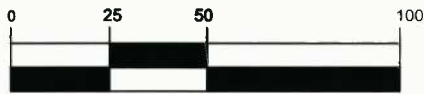
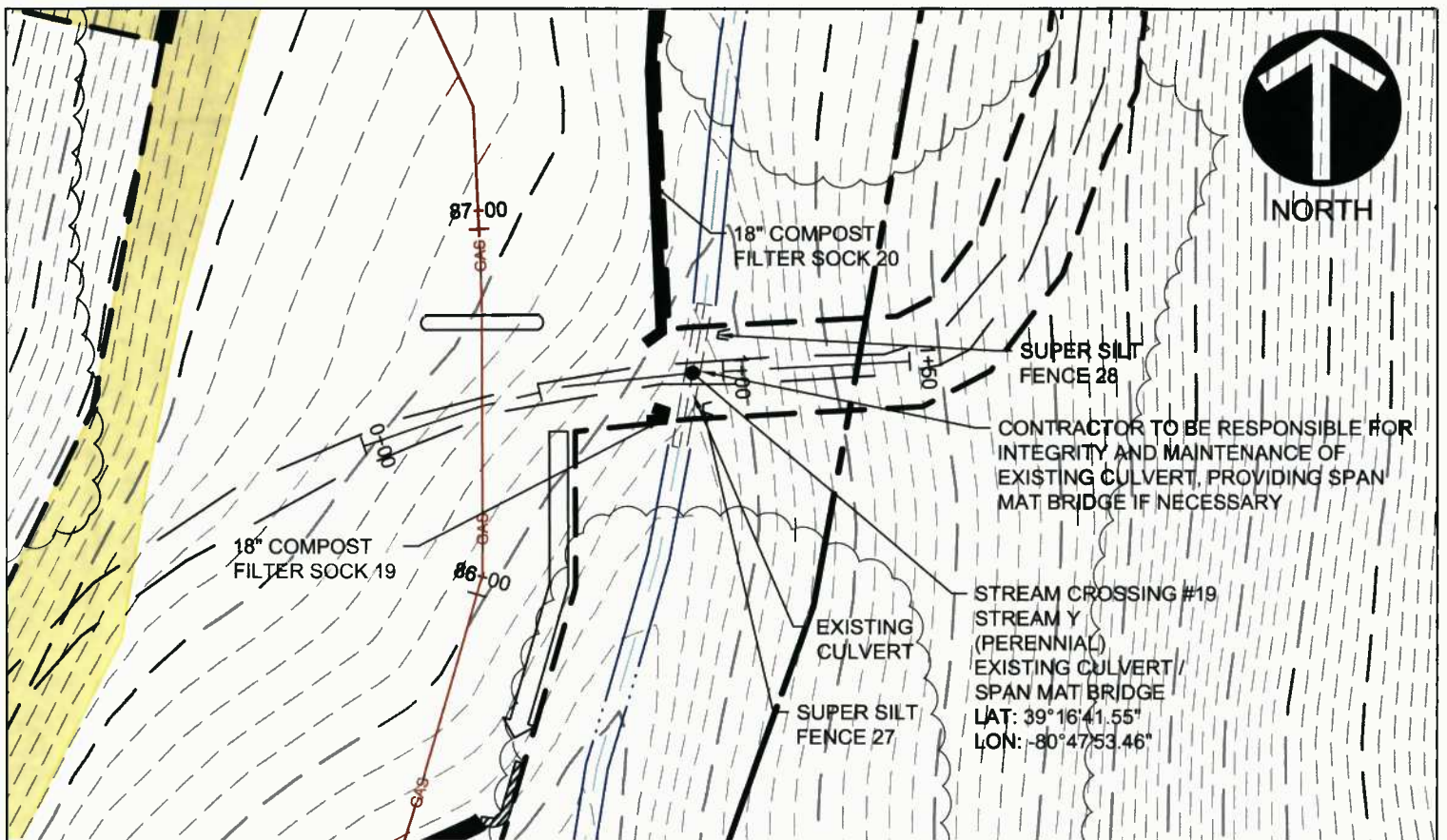
© Gateway Engineers Inc. All Rights Reserved

WV Flood Map - Non-Impact 9

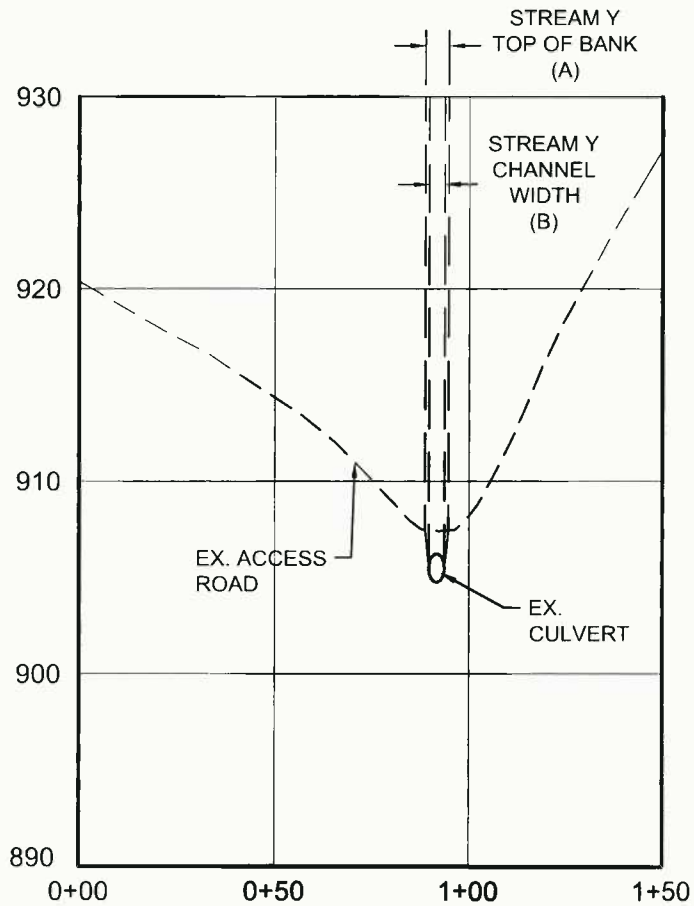


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #18</p>	<p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1066 ft</p> <p>Location (long, lat): (80.802814 W, 39.273905 N)</p> <p>Location (UTM 17N): (517009, 4347191)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	---	--



(IN FEET)
1 inch = 50 ft.



STREAM CROSSING #19
PLAN AND PROFILE

Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Index Number:
Drawn By: LJS
Checked By: MEB
Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

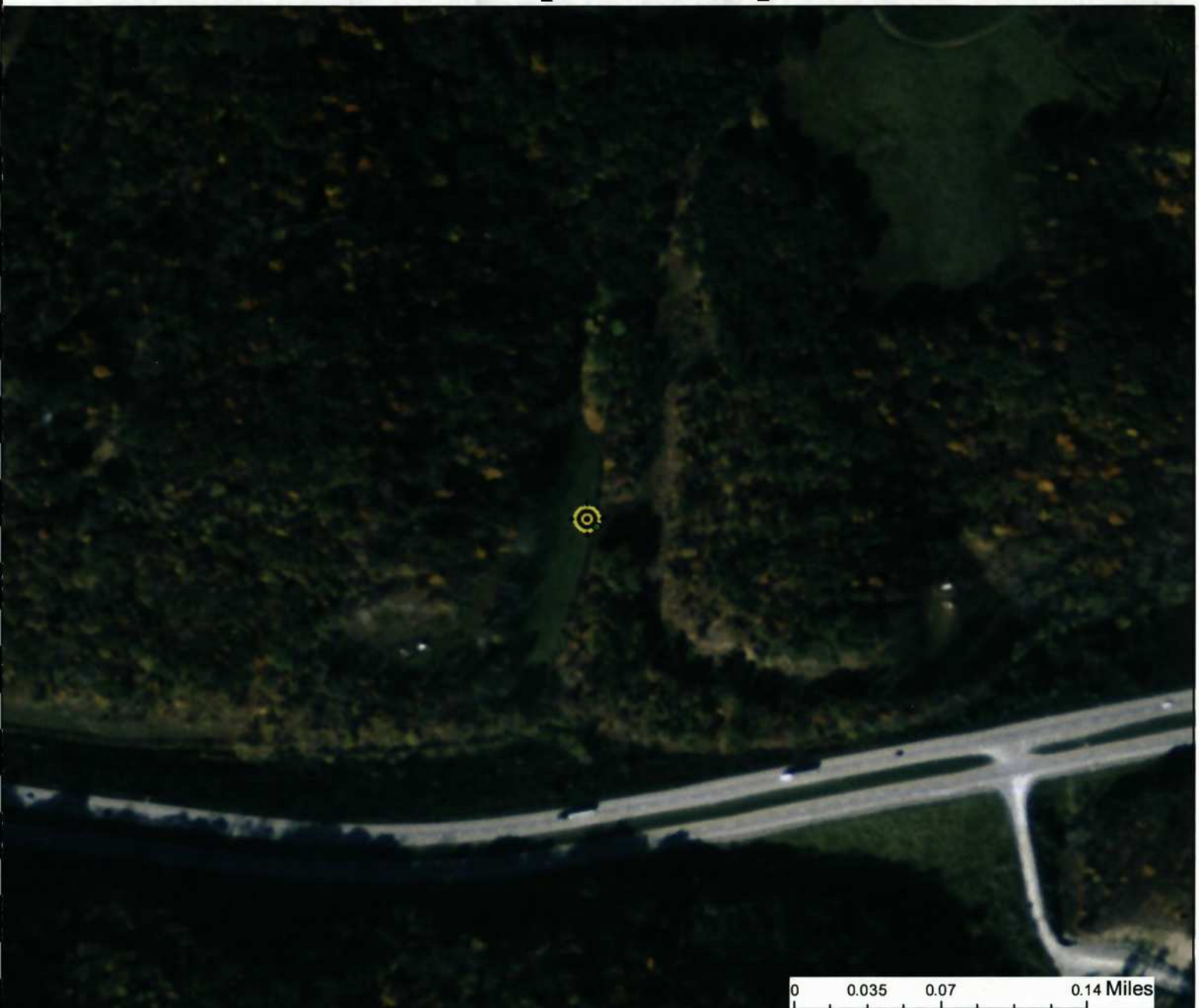
Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	



The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA

gatewayengineers.com 855-634-9284

WV Flood Map - Non-Impact 10



0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

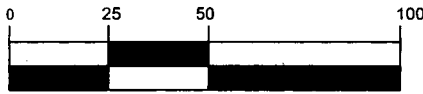
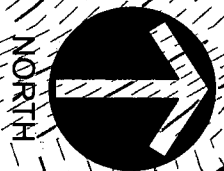
<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #19</p> <p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 914 ft</p> <p>Location (long, lat): (80.798254 W, 39.278257 N)</p> <p>Location (UTM 17N): (517401, 4347674)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	---

CONTRACTOR TO BE RESPONSIBLE FOR
INTEGRITY AND MAINTENANCE OF
EXISTING CULVERT, PROVIDING SPAN
MAT BRIDGE IF NECESSARY

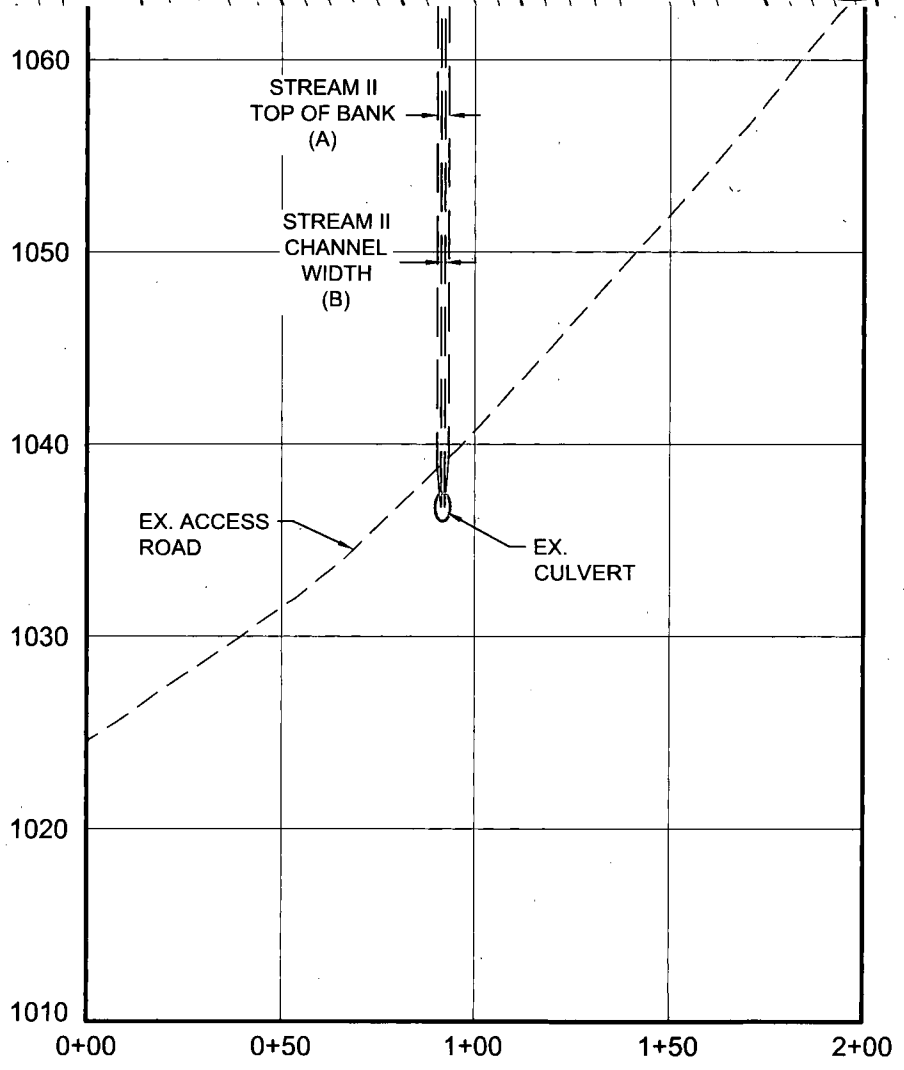
18" COMPOST
FILTER SOCK 35

18" COMPOST
FILTER SOCK 36'

STREAM CROSSING #20
STREAM II
(EPHEMERAL)
EXISTING CULVERT /
SPAN MAT BRIDGE
LAT: 39°17'02.22"
LON: -80°48'31.73"



(IN FEET)
1 inch = 50 ft.



STREAM CROSSING #20
PLAN AND PROFILE

Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC, 2015
Index Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

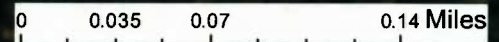
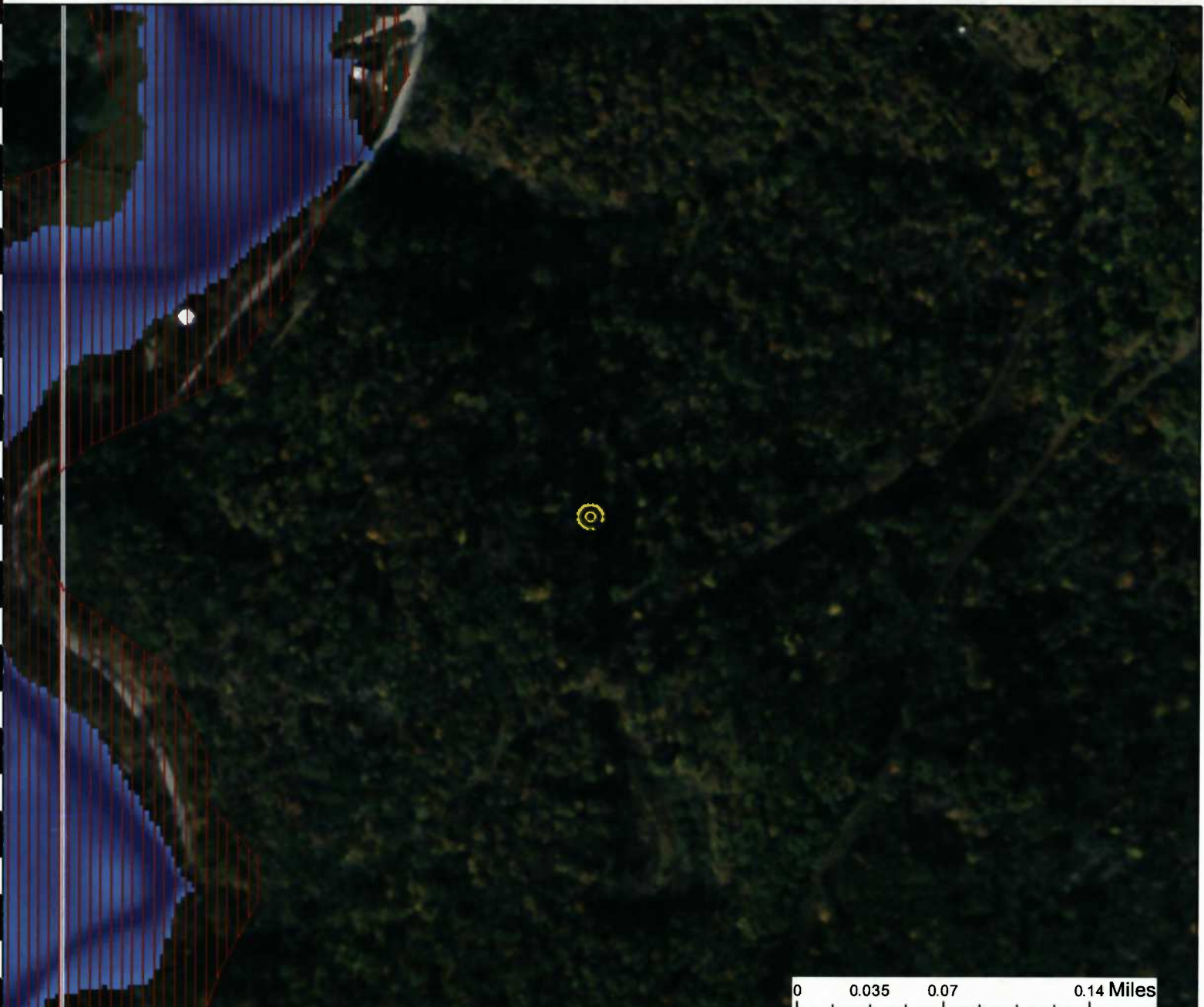
PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



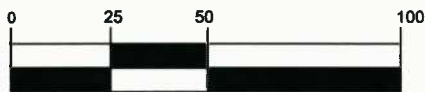
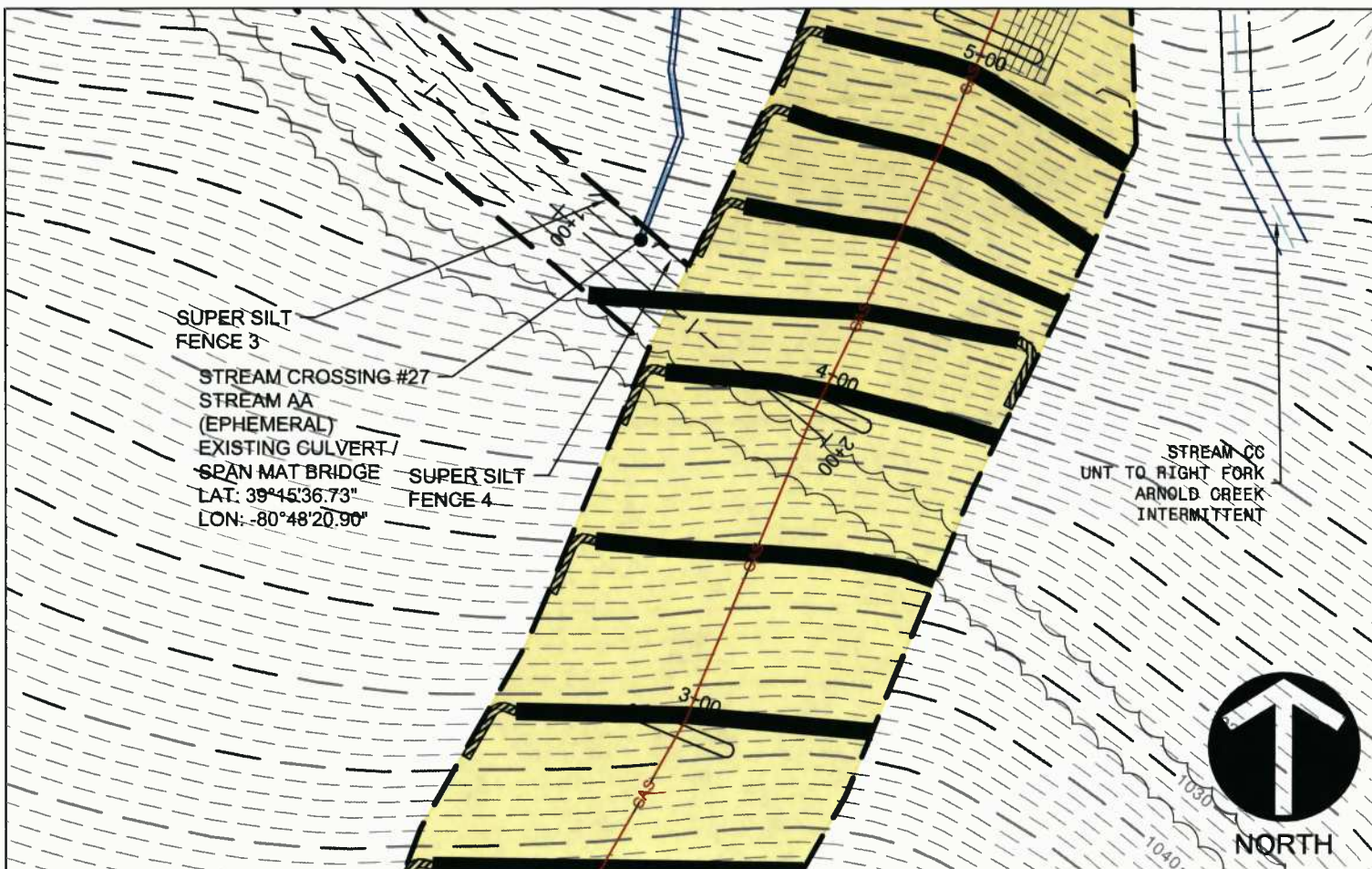
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

WV Flood Map - Non-Impact 11



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #20</p>	<p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5031)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1037 ft</p> <p>Location (long, lat): (80.808875 W, 39.284012 N)</p> <p>Location (UTM 17N): (516484, 4348311)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #27
PLAN

Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC. 2015
Issue Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB

APPENDIX N

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

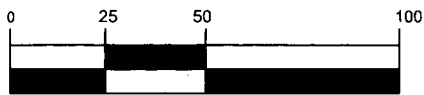
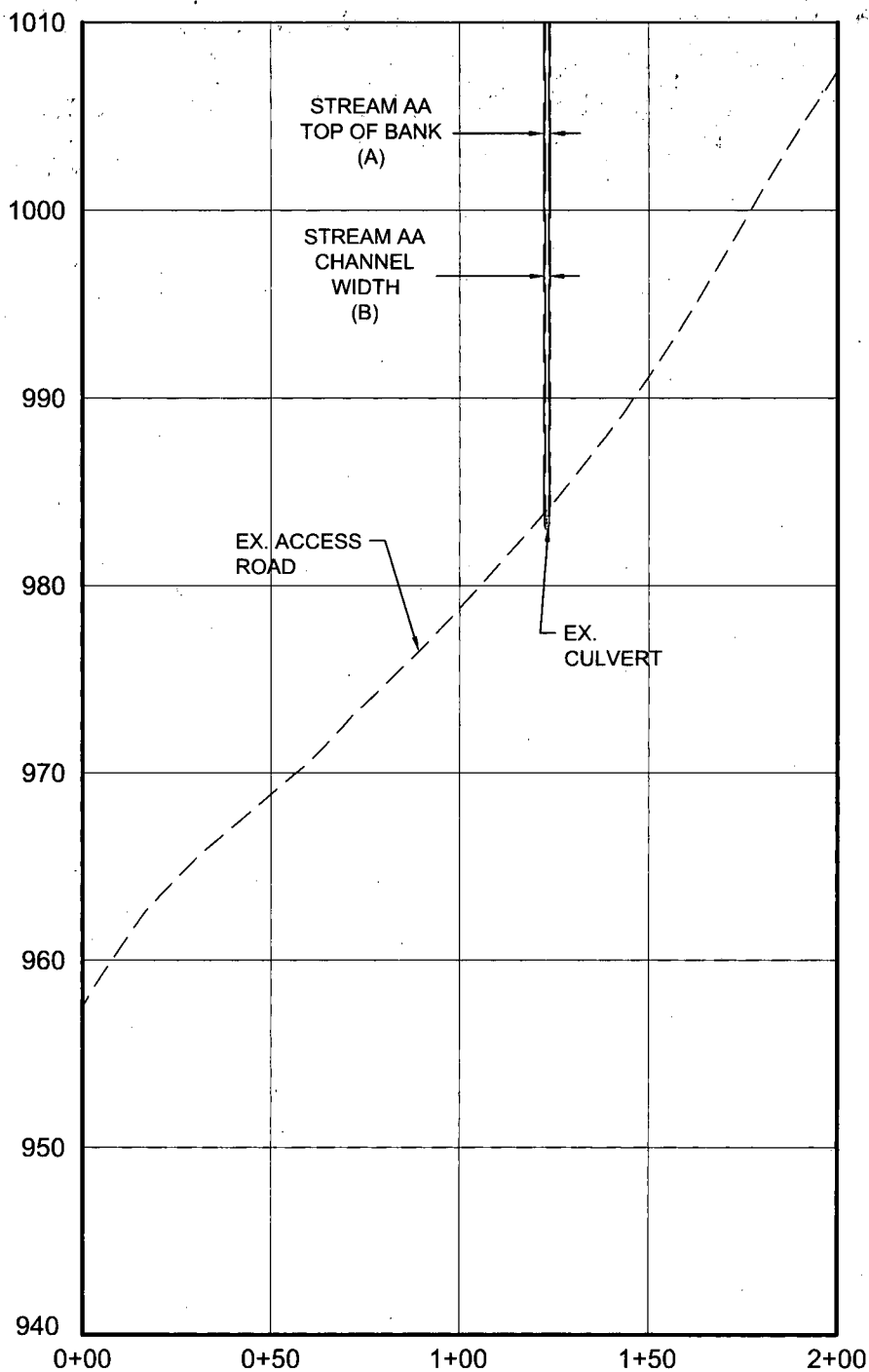
PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA

gatewayengineers.com 855-634-8284



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #27
PROFILE

Project Number: C-18422-0010
Drawing Scale: 1"=50'
Date Issued: DEC 2015
Inisor Number:
Drawn By: TJS
Checked By: MEB
Project Manager: MEB

APPENDIX N

MOSA D003 / MOSA S036 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

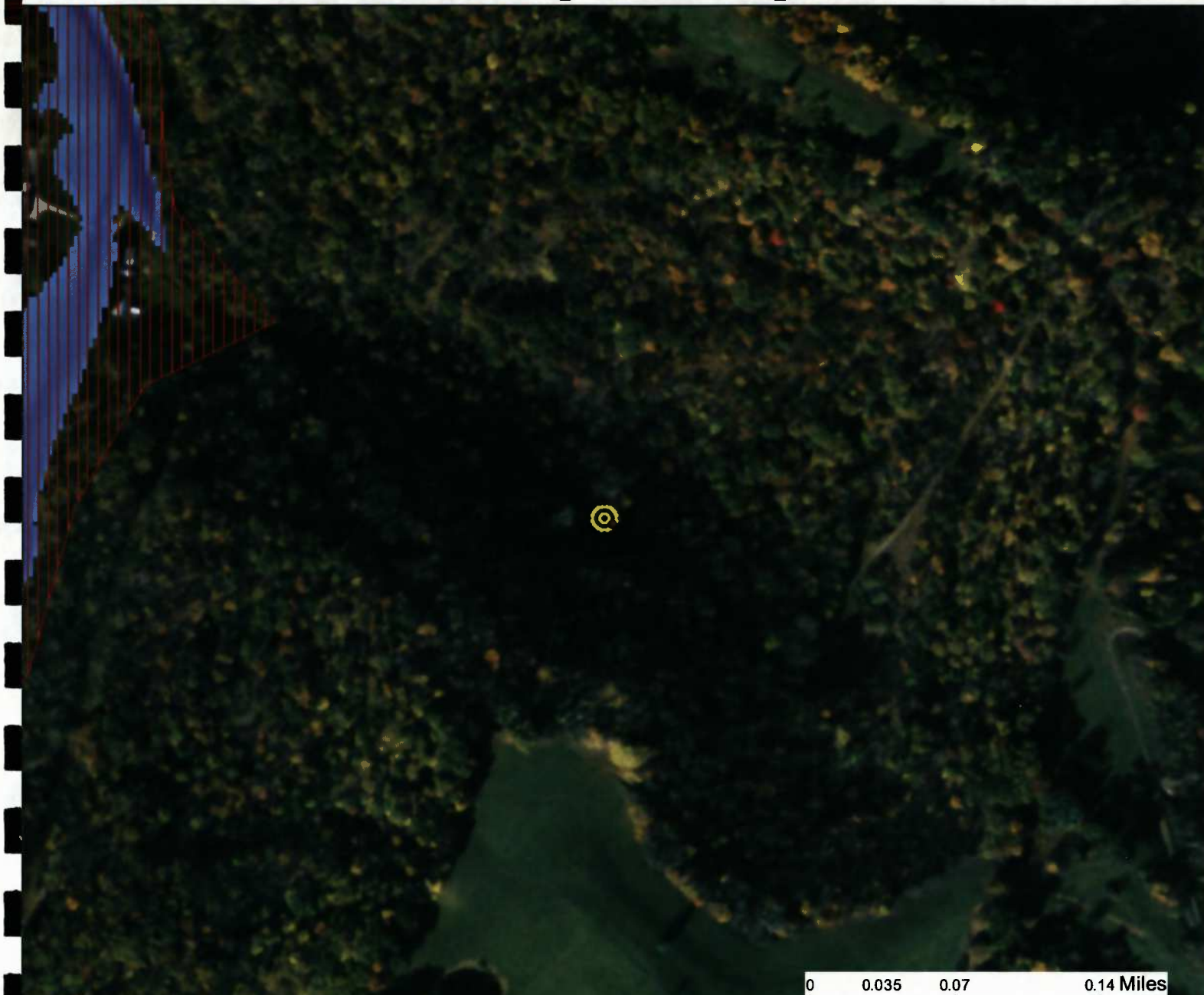
PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

WV Flood Map - Non-Impact 12



0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Location of flood information</p> <p>User Notes: Stream Crossing #27</p>		<p>Map created on January 7, 2016</p>	
<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>	<p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 977 ft</p> <p>Location (long, lat): (80.805871 W, 39.260241 N)</p> <p>Location (UTM 17N): (516749, 4345674)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>		
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>			








WV Flood Map - Non-Impact 13

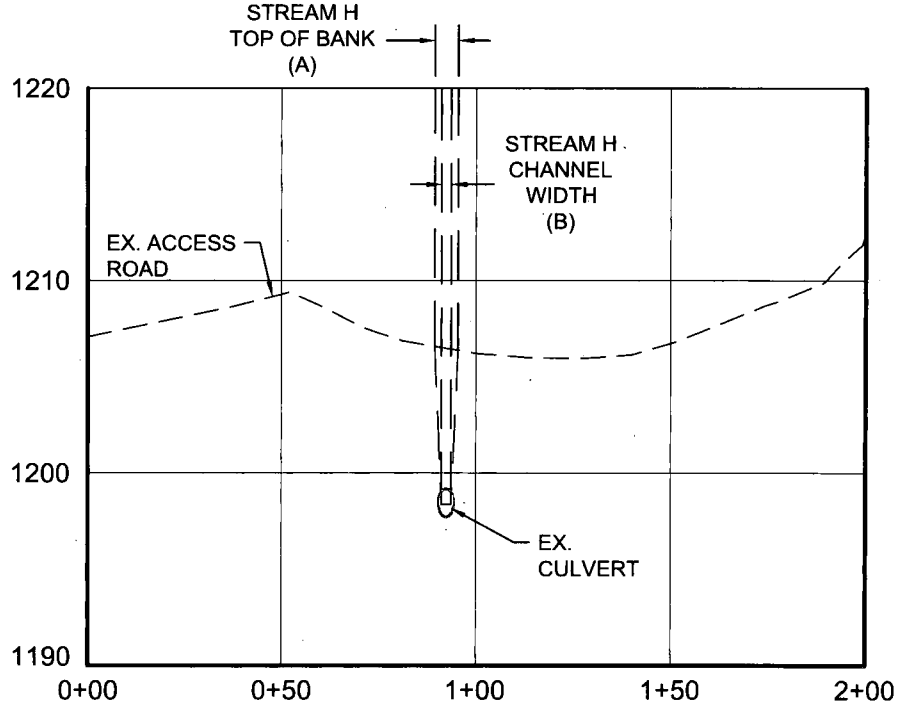
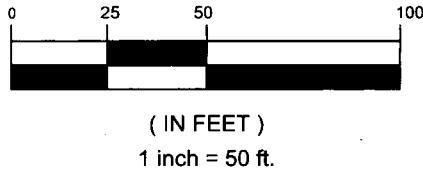
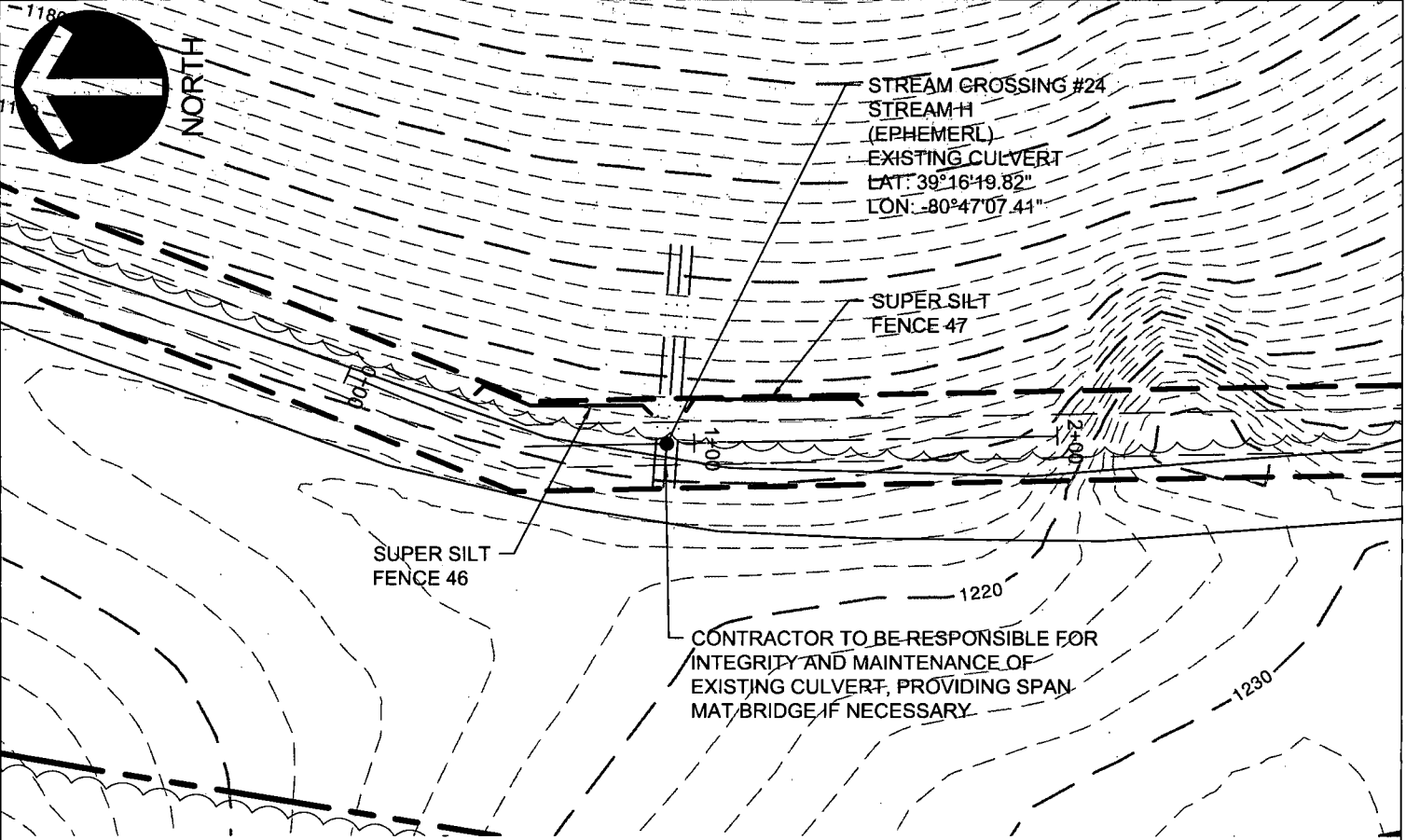
54017C0120C Effective: 10/1/2011

0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

Map created on January 7, 2016

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>	<p> Location of flood information</p> <p>User Notes: Stream Crossing #13</p>	<p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1159 ft</p> <p>Location (long, lat): (80.800700 W, 39.255888 N)</p> <p>Location (UTM 17N): (517196, 4345191)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	--



STREAM CROSSING #24 PLAN AND PROFILE
 Project Number: 18422-0012
 Drawing Scale: 1"=50'
 Date Issued: DEC. 2015
 Issue Number:
 Drawn By: TJS
 Checked By: MEB
 Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

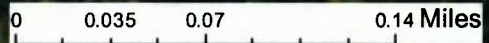
PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map - Non-Impact 14



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #24</p>	<p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1215 ft</p> <p>Location (long, lat): (80.785465 W, 39.272219 N)</p> <p>Location (UTM 17N): (518506, 4347007)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



STREAM CROSSING #25
 STREAM F
 (PERENNIAL)
 EXISTING CULVERT
 LAT: 39°15'39.90"
 LON: -80°47'31.74"

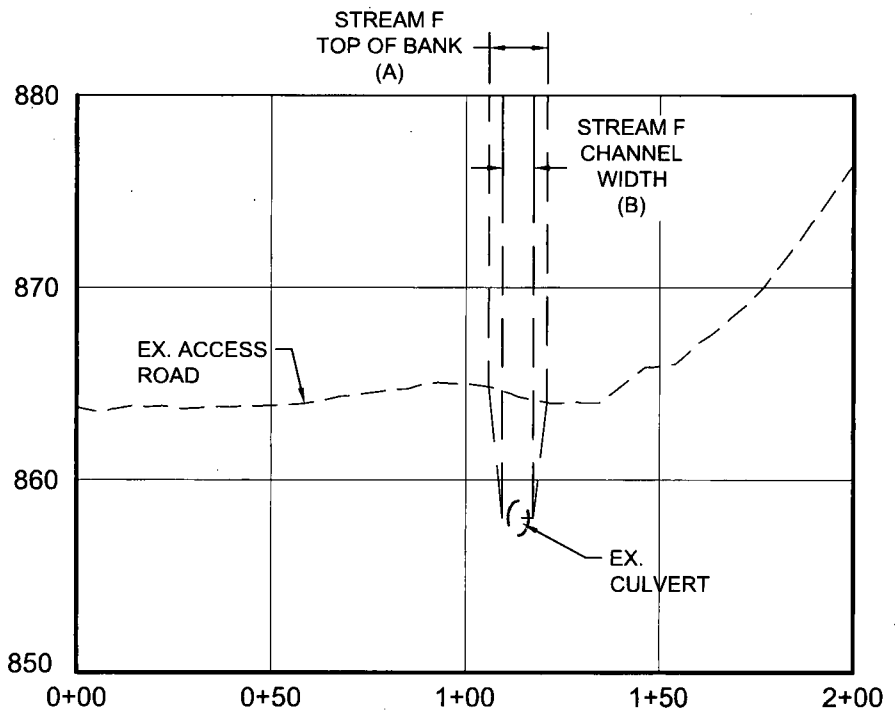
SUPER SILT
 FENCE 51

18" COMPOST
 FILTER SOCK 134

CONTRACTOR TO BE RESPONSIBLE FOR
 INTEGRITY AND MAINTENANCE OF
 EXISTING CULVERT, PROVIDING SPAN
 MAT BRIDGE IF NECESSARY



(IN FEET)
 1 inch = 50 ft.



STREAM CROSSING
 #25 PLAN AND
 PROFILE

Project Number: 18422-0012
 Drawing Scale: 1"=50'
 Date Issued: DEC. 2016
 Issue Number:
 Drawn By: TJS
 Checked By: MEB
 Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

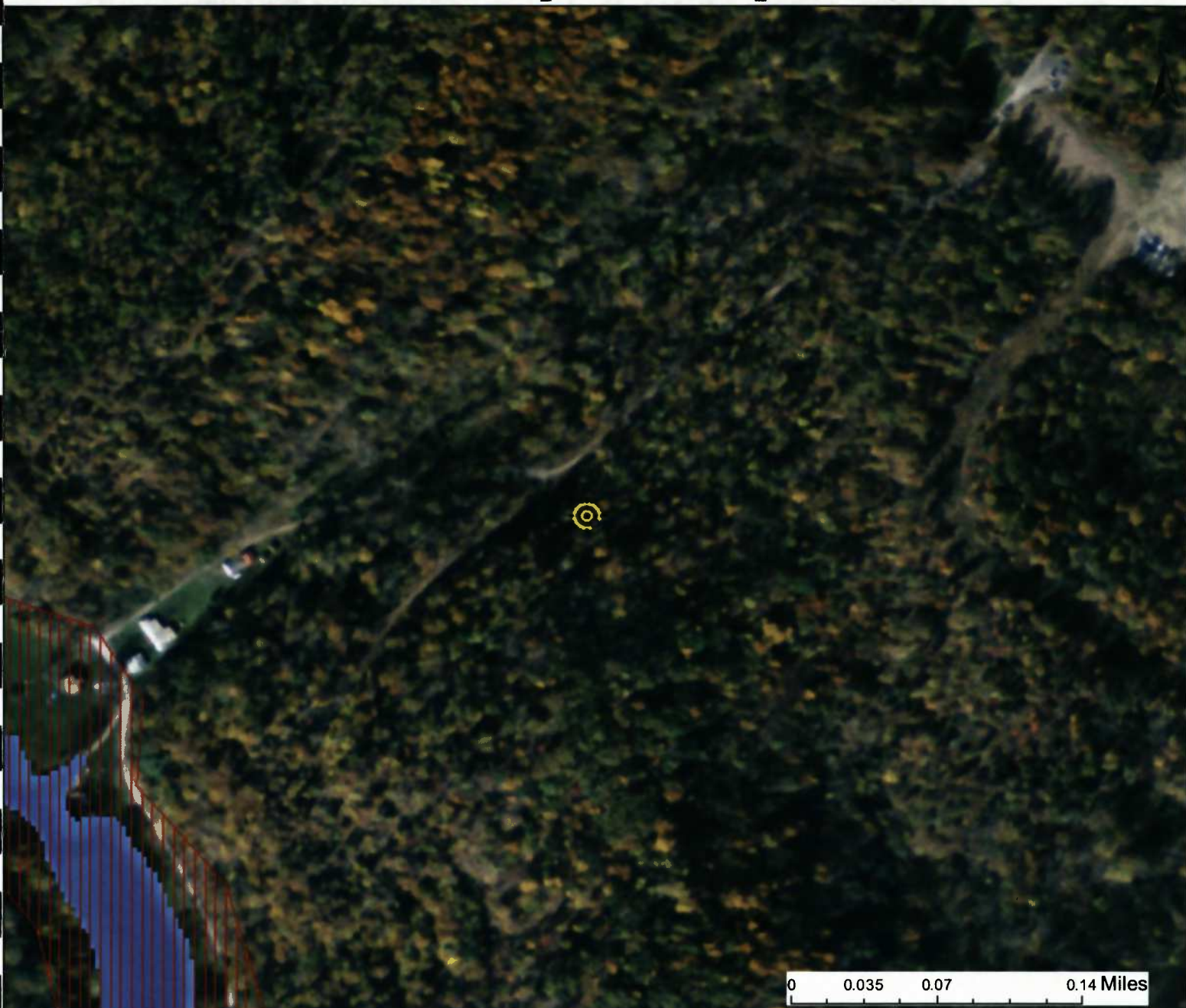


The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA

gatewayengineers.com

855-634-9284

WV Flood Map - Non-Impact 15



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #25</p> <p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 999 ft</p> <p>Location (long, lat): (80.790132 W, 39.261130 N)</p> <p>Location (UTM 17N): (518106, 4345775)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	---



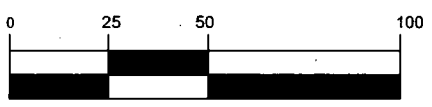
NORTH

STREAM CROSSING #26
 STREAM-G
 (EPHEMERL)
 EXISTING-CULVERT
 LAT: 39°15'41.57"
 LON: -80°47'24.24"

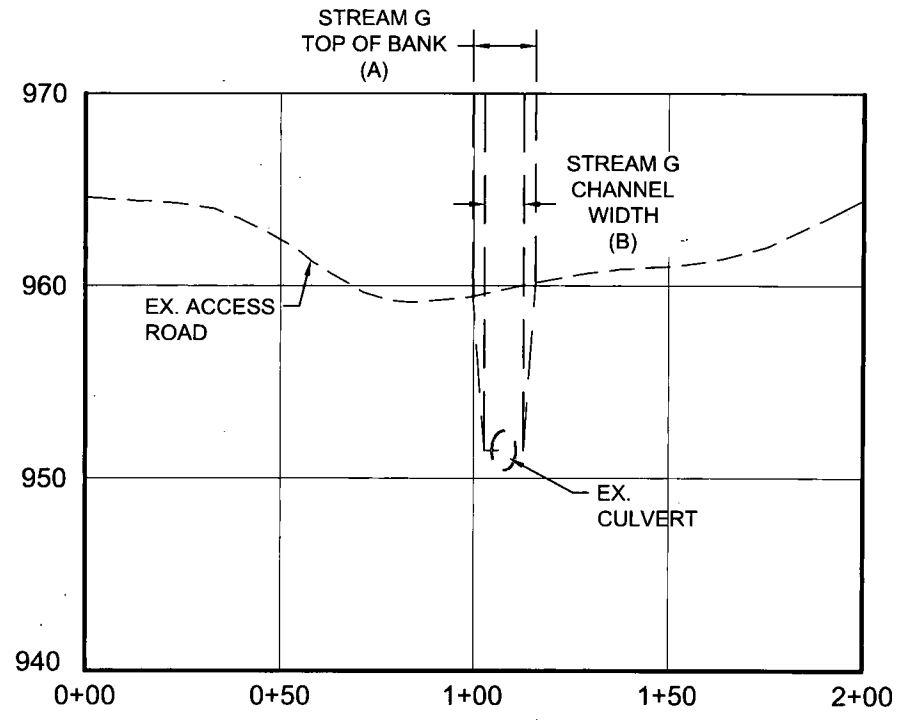
SUPER-SILT FENCE 49

SUPER SILT FENCE 50

CONTRACTOR TO BE RESPONSIBLE FOR
 INTEGRITY AND MAINTENANCE OF
 EXISTING CULVERT, PROVIDING SPAN
 MAT BRIDGE IF NECESSARY



(IN FEET)
 1 inch = 50 ft.



STREAM CROSSING
 #26 PLAN AND
 PROFILE
 Project Number: 18422-0012
 Drawing Scale: 1"=50'
 Date Issued: DEC 2015
 Index Number:
 Drawn By: TJS
 Checked By: MEB
 Project Manager: MEB

MOSA D003 / MOSA S036 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

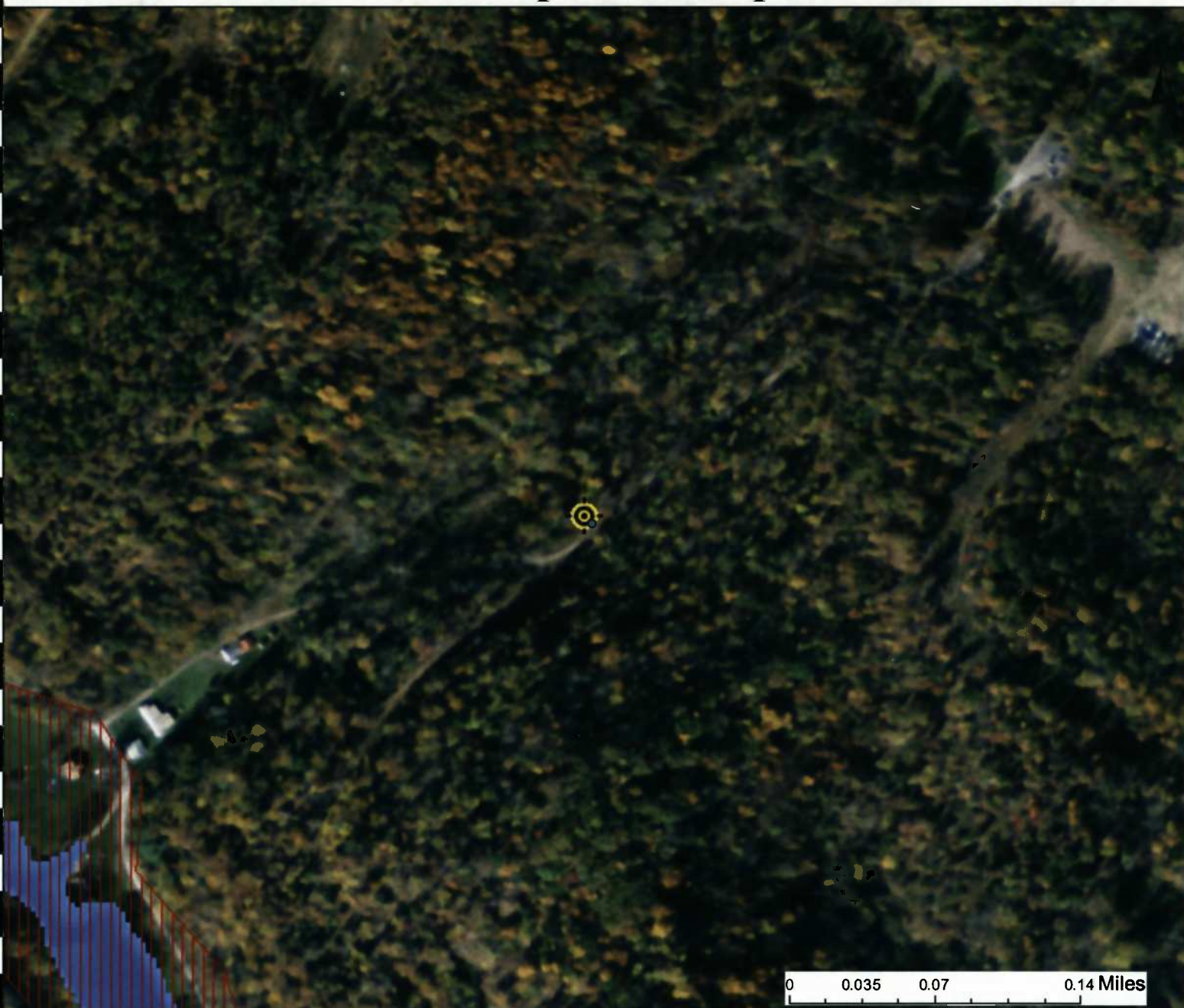
Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers Inc. All Rights Reserved

WV Flood Map - Non-Impact 16



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #26</p>	<p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 952 ft</p> <p>Location (long, lat): (80.790132 W, 39.261595 N)</p> <p>Location (UTM 17N): (518106, 4345827)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	---	--

APPENDIX O
STREAM IMPACT TABLES

Table 1

Impacted Streams within the Project Area (Regulated Floodplain)

Description	Designation ¹	Waterbody	Stream Type	Stream Classification ²	Approx. Station	Crossing Location	County	Nearest Intersection	Crossing Method	Top of Bank Width (feet)	Crossing Length (feet)	Fill Material (cu. ft)	Crossing Area (sq. ft)	Stream Dimensions ³			
														Channel Width (feet)	Channel Depth (feet)	Water Width (feet)	Water Depth (feet)
MOSA D003 Impacts																	
Crossing #2	Stream EE	Left Fork Arnold Creek	Perennial	WWF	42+28	Lat 39°16'08.22" Lon -80°48'06.87"	Doddridge	CR 11/4 & CR 11	Open Cut/Span Mat	25	51.3	417	1281.3	15.0	5.0	12	0.5
Crossing #7	Stream S	Arnold Creek	Perennial	WWF	141+07	Lat 39°17'07.10" Lon -80°48'45.10"	Doddridge	Central Station Rd & Zeros Lane	Open Cut/Span Mat	30	50.6	500	1518.0	20.0	10.0	20	1
Crossing #8	Stream R	UNT to Arnold Creek	Intermittent	N/A	158+37	Lat 39°17'21.34" Lon -80°48'50.83"	Doddridge	Pichette Drive & Caratelli Dr	Open Cut/Span Mat	10	51.8	167	518.0	6.0	3.0	Dry	Dry
Crossing #9	Stream Q	Arnold Creek	Perennial	WWF	190+50	Lat 39°17'40.06" Lon -80°49'12.34"	Doddridge	CR 11/2 & Central Station Road	Open Cut/Span Mat	30	50.1	500	2391.5	25.0	4.0	25	1
Crossing #10	Stream M	Arnold Creek	Perennial	WWF	208+89	Lat 39°17'56.47" Lon -80°49'15.26"	Doddridge	CR 11/2 & Central Station Road	Open Cut/Span Mat	60	62.8	1,000	3784.5	50.0	6.0	30	0.83
Crossing #11	Stream M	Arnold Creek	Perennial	WWF	213+57	Lat 39°17'59.56" Lon -80°49'19.56"	Doddridge	CR 11/2 & Central Station Road	Open Cut/Span Mat	60	58.4	1,000	2949.8	50.0	6.0	30	0.83
Crossing #14	Stream BB	UNT to Right Fork Arnold Creek	Intermittent	N/A	AR-1	Lat 39°15'41.25" Lon -80°48'31.44"	Doddridge	CR 11 & Lilac Lane	Existing Culvert / Span Mat	12	108.5	200	1302.0	8.0	3.0	Dry	Dry
Crossing #21	Stream Q	Arnold Creek	Perennial	WWF	AR-8	Lat 39°17'24.20" Lon -80°48'47.15"	Doddridge	Pichette Drive & Caratelli Dr	Existing Ford Crossing	30	25.0	500	750.0	25.0	4.0	25	1
Crossing #22	Stream Q	Arnold Creek	Perennial	WWF	AR-9	Lat 39°17'41.48" Lon -80°49'04.12"	Doddridge	CR 11/2 & Central Station Road	Existing Ford Crossing	30	25.0	500	750.0	25.0	4.0	25	10
Crossing #23	Stream HH	UNT to Arnold Creek	Ephemeral	N/A	AR-9	Lat 39°17'41.37" Lon -80°49'03.96"	Doddridge	CR 11/2 & Central Station Road	Existing Ford Crossing	3	25.0	50	75.0	1.5	3.0	0.17	0.5
MOSA S036 Impacts																	
Crossing #12	Stream D	Left Fork Arnold Creek	Perennial	WWF	29+46	Lat 39°15'27.27" Lon -80°47'36.25"	Doddridge	CR 11/4 & Log Cabin Hill Road	Open Cut/Span Mat	30	50.8	550	1524.0	20.0	4.0	16	0.5
Total USACE Impacts											559.3	5,384	16,844.1 (0.39 ac)				

Notes:

1. This preliminary determination of jurisdictional status is based on the Corps/EPA JDI Guidebook instruction.
2. WWF – Warm Water Fishery, as classified by WV Requirements Governing Water Quality Standards Rule – Title 47CR52.
3. All dimensions in the table are approximate.

Table 1

Impacted Streams within the Project Area (Unregulated Floodplain)

Description	Designation ¹	Waterbody	Stream Type	Stream Classification ²	Approx. Station	Crossing Location	County	Nearest Intersection	Crossing Method	Top of Bank Width (feet)	Crossing Length (feet)	Fill Material (cu. ft)	Crossing Area (sq. ft)	Stream Dimensions ³			
														Channel Width (feet)	Channel Depth (feet)	Water Width (feet)	Water Depth (feet)
MOSA D003 Impacts																	
Crossing #1	Stream BB	UNT to Right Fork Arnold Creek	Intermittent	N/A	5+67	Lat 39°15'37.81" Lon -80°48'19.36"	Doddridge	CR 11 & Lilac Lane	Open Cut/Span Mat	12	50.6	200	606.8	8.0	3.0	Dry	Dry
Crossing #3	Stream FF	UNT to Pritchard Run	Intermittent/Ephemeral	N/A	75+57	Lat 39°16'30.80" Lon -80°47'53.59"	Doddridge	US 50 & CR 50/41	HDD / Span Mat	4	N/A	N/A	0.0	3.0	2.0	Dry	Dry
Crossing #4	Stream X	Pritchard Run	Perennial	N/A	82+60	Lat 39°16'37.65" Lon -80°47'54.81"	Doddridge	CR 50/30 & Preachers Run	HDD	8	N/A	N/A	0.0	6.0	3.0	6	1
Crossing #5	Stream Y	UNT to Pritchard Run	Perennial	N/A	83+12	Lat 39°16'38.16" Lon -80°47'54.77"	Doddridge	CR 50/30 & Preachers Run	HDD	6	N/A	N/A	0.0	4.0	2.0	2	2
Crossing #6	Stream W	UNT to Pritchard Run	Perennial	N/A	108+41	Lat 39°16'52.03" Lon -80°48'13.33"	Doddridge	CR 50/30 & Preachers Run	Open Cut/Span Mat	6	51.1	100	306.6	5.0	2.0	2	0.25
Crossing #15	Stream OO	UNT to Right Fork Arnold Creek	Ephemeral	N/A	AR-2	Lat 39°16'04.03" Lon -80°48'23.97"	Doddridge	CR 11/4 & CR 11	Existing Culvert / Span Mat	9	25.0	150	225.0	4.0	5.0	Dry	Dry
Crossing #16	Stream PP	UNT to Right Fork Arnold Creek	Intermittent	N/A	AR-2	Lat 39°16'03.26" Lon -80°48'23.80"	Doddridge	CR 11/4 & CR 11	Existing Culvert / Span Mat	3	25.0	50	75.0	7.0	1.0	Dry	Dry
Crossing #17	Stream PP	UNT to Right Fork Arnold Creek	Intermittent	N/A	AR-2	Lat 39°16'02.38" Lon -80°48'21.96"	Doddridge	CR 11/4 & CR 11	Existing Culvert / Span Mat	3	25.0	50	75.0	7.0	1.0	Dry	Dry
Crossing #18	Stream KK	UNT to Left Fork Arnold Creek	Intermittent	N/A	AR-3	Lat 39°16'25.91" Lon -80°48'09.85"	Doddridge	US 50 & CR 50/30	Existing Culvert / Span Mat	6	25.0	100	150.0	3.0	3.0	0.5	0.33
Crossing #19	Stream Y	UNT to Pritchard Run	Perennial	N/A	AR-5	Lat 39°16'41.55" Lon -80°47'53.46"	Doddridge	CR 50/30 & Preachers Run	Existing Culvert / Span Mat	6	25.0	100	150.0	4.0	2.0	2	2
Crossing #20	Stream II	UNT to Arnold Creek	Ephemeral	N/A	AR-6	Lat 39°17'02.22" Lon -80°48'31.73"	Doddridge	Central Station Rd & Subie Acres Drive	Existing Culvert / Span Mat	3	25.0	50	75.0	1.0	2.0	0.5	0
Crossing #27	Stream AA	UNT to Right Fork Arnold Creek	Ephemeral	N/A	AR-1	Lat 39°15'36.73" Lon -80°48'20.90"	Doddridge	CR 11 & Lilac Lane	Existing Culvert / Span Mat	1	3.7	3	3.7	1.0	0.5	Dry	Dry
MOSA S036 Impacts																	
Crossing #13	Stream A	UNT to Right Fork Arnold Creek	Perennial	N/A	54+53	Lat 39°15'21.05" Lon -80°48'02.26"	Doddridge	CR 11/4 & Log Cabin Hill Road	Open Cut/Span Mat	5	44.8	91	224.0	1.5	2.0	Dry	Dry
Crossing #24	Stream H	UNT to Brushy Fork	Intermittent/Ephemeral	N/A	AR-11	Lat 39°16'19.82" Lon -80°47'07.41"	Doddridge	US 50 & Bulldog Drive	Existing Culvert / Span Mat	6	25.0	110	150.0	2.5	8.0	Dry	Dry

Floodplain Development Application Permit
 MOSA D003 / MOSA S036 Pipeline
 EQM Gathering OpCo, LLC

Crossing #25	Stream F	UNT to Left Fork Arnold Creek	Perennial	N/A	AR-12	Lat 39°15'39.90" Lon -80°47'31.74"	Doddridge	CR 11/4 & Log Cabin Hill Road	Existing Culvert / Span Mat	15	25.0	275	375.0	8.0	6.0	2	0.17	
Crossing #26	Stream G	UNT to Left Fork Arnold Creek	Ephemeral	N/A	AR-12	Lat 39°15'41.57" Lon -80°47'24.24"	Doddridge	CR 11/4 & Log Cabin Hill Road	Existing Culvert / Span Mat	16	25.0	293	400.0	10.0	8.0	Dry	Dry	
Total USACE Impacts											375.2	1,572	2,816.1 (0.06 ac)					

- Notes:**
1. This preliminary determination of jurisdictional status is based on the Corps/EPA JDI Guidebook instruction.
 2. WWF – Warm Water Fishery, as classified by WV Requirements Governing Water Quality Standards Rule – Title 47CRS2.
 3. All dimensions in the table are approximate.



GATEWAY

On Call. On Time. On Target.

#16-412 C
EQM Gathering OpCo, LLC
MOSA S033
Pipeline

C-18422-0011

January 2016

MOSA S033 Pipeline

Doddridge County, West Virginia

PREPARED FOR

EQM Gathering OpCo, LLC.
625 Liberty Avenue
Suite 1700
Pittsburgh, PA 15222

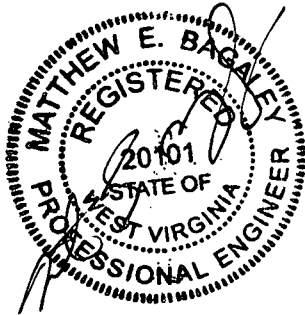
SUBMITTED BY

The Gateway Engineers, Inc.
400 Holiday Drive,
Suite 300
Pittsburgh, PA 15220
412.921.4030 PHONE
412.921.9960 FAX

www.gatewayengineers.com

REVIEWED BY

Matthew E. Bagaley, P.E.



A FULL-SERVICE CIVIL ENGINEERING FIRM

Doddridge County WV Floodplain Development Permit Application

TABLE OF CONTENTS

	<u>Page No.</u>
Floodplain Development Permit Application	Appendix A
USGS Site Location Map	Appendix B
Development Site/Property Information – Impact 1	Appendix C
Development Site/Property Information – Impact 2	Appendix D
Development Site/Property Information – Impact 3	Appendix E
Development Site/Property Information – Impact 4	Appendix F
Development Site/Property Information – Impact 5	Appendix G
Development Site/Property Information – Impact 6	Appendix H
Development Site/Property Information – Impact 7	Appendix I
Development Site/Property Information – Impact 8	Appendix J
Development Site/Property Information – Impact 9	Appendix K
Development Site/Property Information – Impact 10	Appendix L
Unregulated Floodplain Impact Site Maps	Appendix M
Stream Impact Tables	Appendix N

APPENDIX A
FLOODPLAIN DEVELOPMENT PERMIT APPLICATION



Permit# LRH-2016-00024-LKR

Project Name: MOSA S033 Pipeline

Permittees Name: EQM Gathering
OpCo, LLC.

Doddridge County, WV

Floodplain Development Permit Application

This document is to be used for projects that impact/potentially impact the FEMA---designated floodplain and/or floodway of Doddridge County, WV pursuant to the rules and regulations established by all applicable Federal, State and local laws and ordinances, including the Doddridge County Floodplain Ordinance.

SECTION 1: GENERAL PROVISIONS (APPLICANT TO READ AND SIGN)

1. No work may start until a permit is issued.
2. The permit may be revoked if any false statements are made herein.
3. If revoked, all work must cease until permit is re-issued.
4. Development shall not be used or occupied until a Certificate of Compliance is issued.
5. The permit will expire if no work is commenced within six months of issuance.
6. Applicant is hereby informed that other permits may be required to fulfill local, state, and federal requirements.
7. Applicant hereby gives consent to the Floodplain Administrator/Manager or his/her representative to make inspections to verify compliance.
8. I THE APPLICANT CERTIFY THAT ALL STATEMENTS HEREIN AND IN ATTACHMENTS TO THIS APPLICATION ARE, TO THE BEST OF MY KNOWLEDGE, TRUE AND ACCURATE.

APPLICANT'S SIGNATURE

[Signature] (AGENT)

DATE

1/15/16

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Applicant Information:

Please provide all pertinent data.

Applicant Information		
Responsible Company Name: EQM Gathering OpCo, LLC		
Corporate Mailing Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 15222
Corporate Point of Contact (POC): Matt Hoover		
Corporate POC Title: Sr. Environmental Coordinator		
Corporate POC Primary Phone: (724) 873-3009		
Corporate POC Primary Email: mhoover@eqt.com		
Corporate FEIN: 37-1661577	Corporate DUNS:	
Corporate Website: www.eqt.com		
Local Mailing Address: 625 Liberty Avenue		
City: Pittsburgh	State: PA	Zip: 1522
Local Project Manager (PM): Matthew E. Bagaley. P.E.		
Local PM Primary Phone: (412) 921-4030		
Local PM Secondary Phone:		
Local PM Primary Email: mbagaley@gatewayengineers.com		
Person Filing Application: Matt Hoover		
Applicant Title: Sr. Environmental Coordinator		
Applicant Primary Phone: (724)873-3009		
Applicant Secondary Phone:		
Applicant Primary Email: mhoover@eqt.com		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Project Narrative:

Describe in detail the proposed development including project name/title, type of development, estimated start and completion timeline, and its potential impact on the floodplain. Use additional copies of this page as needed.

Project Narrative:

The project proponent, EQM Gathering OpCo, LLC. is proposing to construct approximately 6.5 miles of (1) 20-inch steel natural gas pipeline beginning at the MOSA S001B and MOSA S032 pipelines on South Fork Hughes River Road and ending at the Janus Compressor Station on the west side of Left Fork Run Road (C.R. 11/4) located in Doddridge County, West Virginia, southwest of West Union. The construction activity will also consist of the improvement of approximately 7.5 miles of existing gravel access road. The project will require thirty-three (33) stream crossings and three (3) wetland crossings for access road and pipeline installation. Of the thirty-three stream crossings, ten of them are impacting regulated floodplains. Pipeline installation will be performed by open cut and conventional bore. The access roads will utilize existing culverts and ford crossings. All impacts will be temporary and the streams restored to their original condition after completion of the pipe installation. Consequently, mitigation is not proposed. The limits of disturbance will encompass approximately 94.7 acres. Location and site maps are attached. The project will begin February 2016 and end October 2016. Construction cost for these crossings estimated at \$800,000 equating to a permit fee of \$4,000.

Impact #1: (Referenced as Crossing #1 – Stream AA in Appendix B & C) – Crossing is proposed as a open cut with a span mat of UNT to South Fork Hughes River Creek, an intermittent stream.

Impact #2: (Referenced as Crossing #2 – Stream BB in Appendix B & D) – Crossing is proposed as a conventional bore and span mat of South Fork Hughes River, a perennial stream.

Impact #3: (Referenced as Crossing #3 – Stream CC in Appendix B & E) – Crossing is proposed as a open cut with a span mat of UNT to South Fork Hughes River, an intermittent stream.

Impact #4: (Referenced as Crossing #4 – Stream BB in Appendix B & F) – Crossing is proposed as a conventional bore and span mat of South Fork Hughes River, a perennial stream.

Impact #5: (Referenced as Crossing #5 – Stream DD in Appendix B & G) – Crossing is proposed as a open cut with a span mat of UNT to South Fork Hughes River, an ephemeral stream.

Impact #6: (Referenced as Crossing #6 – Stream EE in Appendix B & H) – Crossing is proposed as a open cut with a span mat of UNT to South Fork Hughes River, an intermittent stream.

Impact #7: (Referenced as Crossing #7 – Stream BB in Appendix B & I) – Crossing is proposed as a conventional bore and span mat of South Fork Hughes River, a perennial stream.

Impact #8: (Referenced as Crossing #8 – Stream BB in Appendix B & J) – Crossing is proposed as a conventional bore and span mat of South Fork Hughes River, a perennial stream.

Impact #9: (Referenced as Crossing #9 – Stream BB in Appendix B & K) – Crossing is proposed as a conventional bore and span mat of South Fork Hughes River, a perennial stream.

Impact #10: (Referenced as Crossing #10 – Stream BB in Appendix B & L) – Crossing is proposed as a conventional bore and span mat of South Fork Hughes River, a perennial stream.

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Proposed Development:

Please check all elements of the proposed project that apply.

DESCRIPTION OF WORK (CHECK ALL APPLICABLE BOXES)

A. STRUCTURAL DEVELOPMENT

<u>ACTIVITY</u>	<u>STRUCTURAL TYPE</u>
<input type="checkbox"/> New Structure	<input type="checkbox"/> Residential (1 – 4 Family)
<input type="checkbox"/> Addition	<input type="checkbox"/> Residential (more than 4 Family)
<input type="checkbox"/> Alteration	<input type="checkbox"/> Non-residential (floodproofing)
<input type="checkbox"/> Relocation	<input type="checkbox"/> Combined Use (res. & com.)
<input type="checkbox"/> Demolition	<input type="checkbox"/> Replacement
<input type="checkbox"/> Manufactured/Mobil Home	

B. OTHER DEVELOPMENT ACTIVITIES:

- | | | | |
|---|---------------------------------|-----------------------------------|--|
| <input type="checkbox"/> Fill | <input type="checkbox"/> Mining | <input type="checkbox"/> Drilling | <input checked="" type="checkbox"/> Pipelining |
| <input type="checkbox"/> Grading | | | |
| <input type="checkbox"/> Excavation (except for STRUCTURAL DEVELOPMENT checked above) | | | |
| <input type="checkbox"/> Watercourse Alteration (including dredging and channel modification) | | | |
| <input type="checkbox"/> Drainage Improvements (including culvert work) | | | |
| <input type="checkbox"/> Road, Street, or Bridge Construction | | | |
| <input type="checkbox"/> Subdivision (including new expansion) | | | |
| <input type="checkbox"/> Individual Water or Sewer System | | | |
| <input type="checkbox"/> Other (please specify) | | | |

Construction cost for these crossings estimated at \$800,000 equating to a permit fee of \$4,000.

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Contractor Data:

Please provide all pertinent data for contractors and sub---contractors that may be participating in this project. Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: ___ of ___

Contractor/Sub-Contractor (C/SC) Information:		
C/SC Company Name:		
C/SC WV License Number:		
C/SC FEIN:	C/SC DUNS:	
Local C/SC Point of Contact (POC):		
Local C/SC POC Title:		
C/SC Mailing Address:		
City:	State:	Zip-Code:
Local C/SC Office Phone:		
Local C/SC POC Phone:		
Local C/SC POC E-Mail:		

Engineer Firm Information:		
Engineer Firm Name: The Gateway Engineers, Inc.		
Engineer WV License Number: 20101		
Engineer Firm FEIN: 25-1006946	Engineer Firm DUNS: 06-684-3053	
Engineer Firm Primary Point of Contact (POC): Matthew E. Bagaley, P.E.		
Engineer Firm Primary POC Title: Project Manager		
Engineer Firm Mailing Address: 400 Holiday Drive, Suite 300		
City: Pittsburgh	State: PA	Zip-Code: 15220-2727
Engineer Firm Office Phone: (412) 921-4030		
Engineer Firm Primary POC Phone: (412) 921-4030 ext. 153		
Engineer Firm Primary POC E-Mail: mbagaley@gatewayengineers.com		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Site Plan

A Site Plan is an accurate and detailed map of the proposed development for this project. It shows the size, shape, location and special features of the project property, and the size and location of any development planned to the property, especially as that development will impact the floodplain and/or floodway. Site plans show what currently exists on the project property, and any changes or improvements you are proposing to make. **A certified and licensed engineering firm should complete site plans.**

A SITE PLAN MUST CONTAIN THE FOLLOWING INFORMATION:


1. Legal description of the parcel, north arrow and scale
2. All property lines and their dimensions
3. Names of adjacent roads, location of driveways
4. Location of sloughs, tributaries, streams, rivers, wetlands, ponds, and lakes, with setbacks indicated, and including FEMA floodplain data based on most updated FIRM.
5. Location, size, shape of all buildings, existing and proposed, with elevation of lowest floor indicated.
6. Location and dimensions of existing or proposed on-site sewage systems.
7. Location of all propane tanks, fuel tanks or other liquid storage tanks whether above ground or below ground level.
8. Location and dimensions of any proposed pipeline placement(s) into floodplain/floodway.
9. Location and dimensions of any roadway development into floodplain/floodway. *(Includes initial development access roads)*
10. Location and dimensions of any bridge and/or culvert development into floodplain/floodway.
11. Location and dimensions of any storage yard or facility into the floodplain/floodway.
12. Location of any existing utilities and/or proposed utility placement and/or displacement.
13. Location, dimensions and depth of any existing or proposed fill on site.
14. A survey showing the **existing ground elevations** of at least location on the building site. **ELEVATION NOTE:** All vertical datum will reference either NGVD 29 or NAVD 88. Assumed datum will not be acceptable unless the property is located in an area where vertical datum has not been published. For those areas where vertical datum has not been established, a site plan with contours, elevations using assumed datum, high water marks and existing water levels of sloughs, rivers, lakes or streams and proposed lowest floor elevation.

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Applicant

Please read print name, sign and date below:

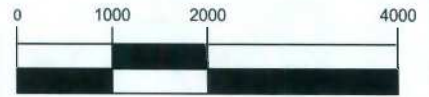
- I certify that I am authorized to submit this application for the primary project developer.
- I certify that the information included in this application is to the best of my knowledge true and complete.
- I certify that all required Federal, State, and local permits required by law and/or ordinance for the above described development of this project have been properly attained, are current and valid, and must be presented with this application before a Doddridge County Floodplain Permit may be issued.
- I understand that if in the course of the development project additional permits become required that were not needed during the initial proposal, the primary developer must notify the Doddridge County Floodplain Manager within 48 hours of such need, and that a "Stop Work" order may be issued for all project work directly impacting the floodplain or floodway, until such time the required additional permits are acquired.
- I understand that once the floodplain permit is submitted, the application will be entered into official public record at the next regularly scheduled Doddridge County Commission meeting after the date of submittal.
- I understand that from the date of submittal of the fully completed permit application, the Doddridge County Floodplain Manager has ninety (90) days to make a determination to either grant or deny said permit application. During this approval period, the Doddridge County Floodplain Manager may, at his or her discretion, conduct a review and/or additional study of provided documentation by means of an independent engineering firm. All costs associated with said review and/or study must be reimbursed to the County before issuance of approved permit.
- I understand that during the approval period, the Doddridge County Floodplain Manager or designee may at his or her discretion conduct site visits and document conditions of proposed development pursuant to the permit application.
- I understand that once the Floodplain Permit is granted, the permit will be entered into official public record at the next scheduled Doddridge County Commission meeting after the date of issuance. Appeals to the permit may be made no later than twenty (20) days after said issuance. If a valid appeal is submitted, as determined by the Doddridge County Floodplain Manager, a "Stop Work" order will be issued for all project development directly involving the floodplain or floodway. A public hearing by the Doddridge County Appeals Board will be scheduled no less than ten (10) days after the next regularly scheduled Doddridge County Commission meeting.
- I understand that all decisions of the Doddridge County Appeals Board shall be final.
- **I understand issuance of a Floodplain Permit authorizes me to proceed with construction as proposed. A Certificate of Compliance is required upon substantial completion of the project.**
- In signing this application, the primary developer hereby grants the Doddridge County Floodplain Manager or designee the right to enter onto the above---described location to inspect the development work proposed, in progress, and/or completed.
- I understand that if I do not follow exactly the site---plan submitted and approved by this permit that a "Stop Work" order may be issued by the Wirt County Floodplain Manager and that I must stop all construction immediately until discrepancies of actual work vs. proposed work is resolved.

Applicant Signature:  (AGENT) Date: 1/15/16

Applicant Printed Name: MATTHEW E. BAGALEY

APPENDIX B
USGS SITE LOCATION MAP

FOR CONTINUATION, SEE SHEET USGS-B



(IN FEET)
1 inch = 2000 ft.

GAS AND OIL FIELD

STREAM CROSSING #21
STREAM MM (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING FORD
LAT: 39°12'33.89"N
LON: 80°47'24.81"W

STREAM CROSSING #22
STREAM MM (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING CULVERT
LAT: 39°12'35.57"N
LON: 80°47'22.69"W

STREAM CROSSING #20
STREAM NN (INTERMITTENT)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING CULVERT
LAT: 39°12'31.53"N
LON: 80°47'26.94"W

STREAM CROSSING #11
STREAM GG (INTERMITTENT)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN
MAT BRIDGE
LAT: 39°11'57.45N
LON: 80°48'22.20"W

STREAM CROSSING #6
STREAM EE (INTERMITTENT)
(REGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE
LAT: 39°11'33.81N
LON: 80°48'01.58"W

STREAM CROSSING #5
STREAM DD (EPHEMERAL)
(REGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN
MAT BRIDGE
LAT: 39°11'31.60N
LON: 80°47'58.68"W

STREAM CROSSING #10
STREAM BB (PERENNIAL)
(REGULATED FLOODPLAIN)
CROSSING: CONVENTIONAL
BORE/SPAN MAT BRIDGE
LAT: 39°11'42.76N
LON: 80°48'20.50"W

STREAM CROSSING #1
(REGULATED FLOODPLAIN)
STREAM AA (INTERMITTENT)
CROSSING: OPEN CUT/SPAN MAT BRIDGE
LAT: 39°11'24.81"N
LON: 80°47'41.79"W

STREAM CROSSING #9
STREAM BB (PERENNIAL)
(REGULATED FLOODPLAIN)
CROSSING: CONVENTIONAL BORE/SPAN
MAT BRIDGE
LAT: 39°11'41.07N
LON: 80°48'16.62"W

TIE INTO MOSAS001B &
MOSAS032 PIPELINES

STREAM CROSSING #8
STREAM BB (PERENNIAL)
(REGULATED FLOODPLAIN)
CROSSING: CONVENTIONAL
BORE/SPAN MAT BRIDGE
LAT: 39°11'40.18"N
LON: 80°48'14.93"W

SOUTH FORK
HUGHES RIVER

LAT: 39°11'24.31"
LON: -80°47'38.95"

STREAM CROSSING #7
STREAM BB (PERENNIAL)
(REGULATED FLOODPLAIN)
CROSSING: CONVENTIONAL
BORE/SPAN MAT BRIDGE
LAT: 39°11'36.15N
LON: 80°48'07.66"W

WETLAND CROSSING #1
WETLAND AA (PEM/PSS) - CROSSING PEM PORTION
CROSSING: OPEN CUT/SPAN MAT BRIDGE
LAT: 39°11'24.81"N
LON: 80°47'41.79"W

STREAM CROSSING #4
STREAM BB (PERENNIAL)
(REGULATED FLOODPLAIN)
CROSSING: CONVENTIONAL
BORE/SPAN MAT BRIDGE
LAT: 39°11'27.04N
LON: 80°47'55.59"W

STREAM CROSSING #3
STREAM CC (INTERMITTENT)
(REGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN
MAT BRIDGE
LAT: 39°11'24.28N
LON: 80°47'50.75"W

STREAM CROSSING #2
(REGULATED FLOODPLAIN)
STREAM BB (PERENNIAL)
CROSSING: CONVENTIONAL BORE/SPAN MAT BRIDGE
LAT: 39°11'24.68N
LON: 80°47'43.39"W

USGS SITE LOCATION MAP

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: C-18422-0011
Drawing Scale: 1" = 2000'
Date Issued: DEC 2015
Index Number:
Drawn By:
Checked By:
Project Manager: DMH

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY®
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

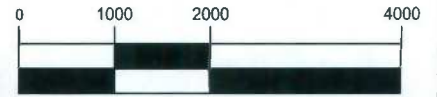
USGS-A

JANUS COMPRESSOR STATION

LAT: 39°15'26.80"
LON: -80°48'22.97"



NORTH



(IN FEET)

1 inch = 2000 ft.

STREAM CROSSING #19
STREAM A (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE

LAT: 39°15'13.11N
LON: 80°48'14.39"W

STREAM CROSSING #32
STREAM K (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING FORD

LAT: 39°15'09.83"N
LON: 80°48'18.86"W

WETLAND CROSSING #3
WETLAND 1 (PEM)
SPAN MAT BRIDGE
LAT: 39°14'44.75"N
LON: 80°48'15.31"W

RIGHT FORK ARNOLD CREEK

STREAM CROSSING #17
STREAM 4 (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE

LAT: 39°14'22.70N
LON: 80°47'47.64"W

STREAM CROSSING #29
STREAM 7 (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING CULVERT / SPAN MAT BRIDGE

LAT: 39°14'19.21"N
LON: 80°47'44.35"W

STREAM CROSSING #14
STREAM S (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE

LAT: 39°13'53.76N
LON: 80°47'59.96"W

STREAM CROSSING #15
STREAM Q (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE

LAT: 39°13'53.90N
LON: 80°47'59.97"W

STREAM CROSSING #27
STREAM N (INTERMITTENT/PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING FORD

LAT: 39°13'30.97"N
LON: 80°48'12.14"W

STREAM CROSSING #26
STREAM N (INTERMITTENT/PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING FORD

LAT: 39°13'29.27"N
LON: 80°48'06.99"W

STREAM CROSSING #24
STREAM T (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING FORD

LAT: 39°13'26.87"N
LON: 80°47'46.61"W

FOR CONTINUATION, SEE SHEET USGS-A

STREAM CROSSING #18
STREAM C (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN
MAT BRIDGE

LAT: 39°14'52.63N
LON: 80°48'16.01"W

PROPOSED 20"
MOSA S033 PIPELINE

LEFT FORK ARNOLD
CREEK

STREAM CROSSING #28
STREAM 18 (EPHEMERAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING CULVERT

LAT: 39°14'20.74"N
LON: 80°47'35.69"W

STREAM CROSSING #16
STREAM 10 (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE

LAT: 39°14'02.87N
LON: 80°47'44.77"W

STREAM CROSSING #25
STREAM N (INTERMITTENT/PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING FORD

LAT: 39°13'29.38"N
LON: 80°47'58.36"W

STREAM CROSSING #13
STREAM N (INTERMITTENT/PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT
BRIDGE

LAT: 39°13'30.32N
LON: 80°47'49.08"W

STREAM CROSSING #23
STREAM T (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: EXISTING CULVERT

LAT: 39°13'19.45"N
LON: 80°47'43.00"W

STREAM CROSSING #12
STREAM LL (PERENNIAL)
(UNREGULATED FLOODPLAIN)
CROSSING: OPEN CUT/SPAN MAT BRIDGE

LAT: 39°13'11.80"N
LON: 80°47'46.33"W

USGS SITE LOCATION MAP

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: C-18422-0011
Drawing Scale: 1" = 2000'
Date Issued: DEC 2015
Index Number: _____
Drawn By: _____
Checked By: _____
Project Manager: DMB

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	



The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA

gatewayengineers.com 855-634-9284

APPENDIX C

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 1

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 1 of 10

Site/Property Information:		
Legal Description: Large Forested Commercial Lot (Stream Crossing #1)		
Physical Address/911 Address: Parcel Tax ID: 7-10-2		
Decimal Latitude/Longitude: 39.190262 N / 80.795017 W		
DMS Latitude/Longitude: 39° 11' 24.81" N / 80° 47' 41.79" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Commercial Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 1 of 10

Property Owner Data:		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.




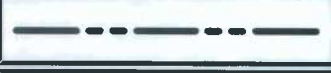


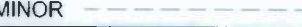


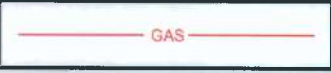






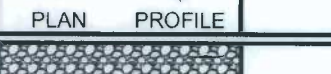





Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ike Morris		
Physical Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Justin L. Henderson Life Estate		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Robert Brannon ETAl		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ike Morris		
Physical Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: 18422-0011
 Drawing Scale: N.T.S.
 Date issued: JAN 2016
 Issue Number:
 Drawn By: JAB
 Checked By: DMH
 Project Manager: DMH

LEGEND

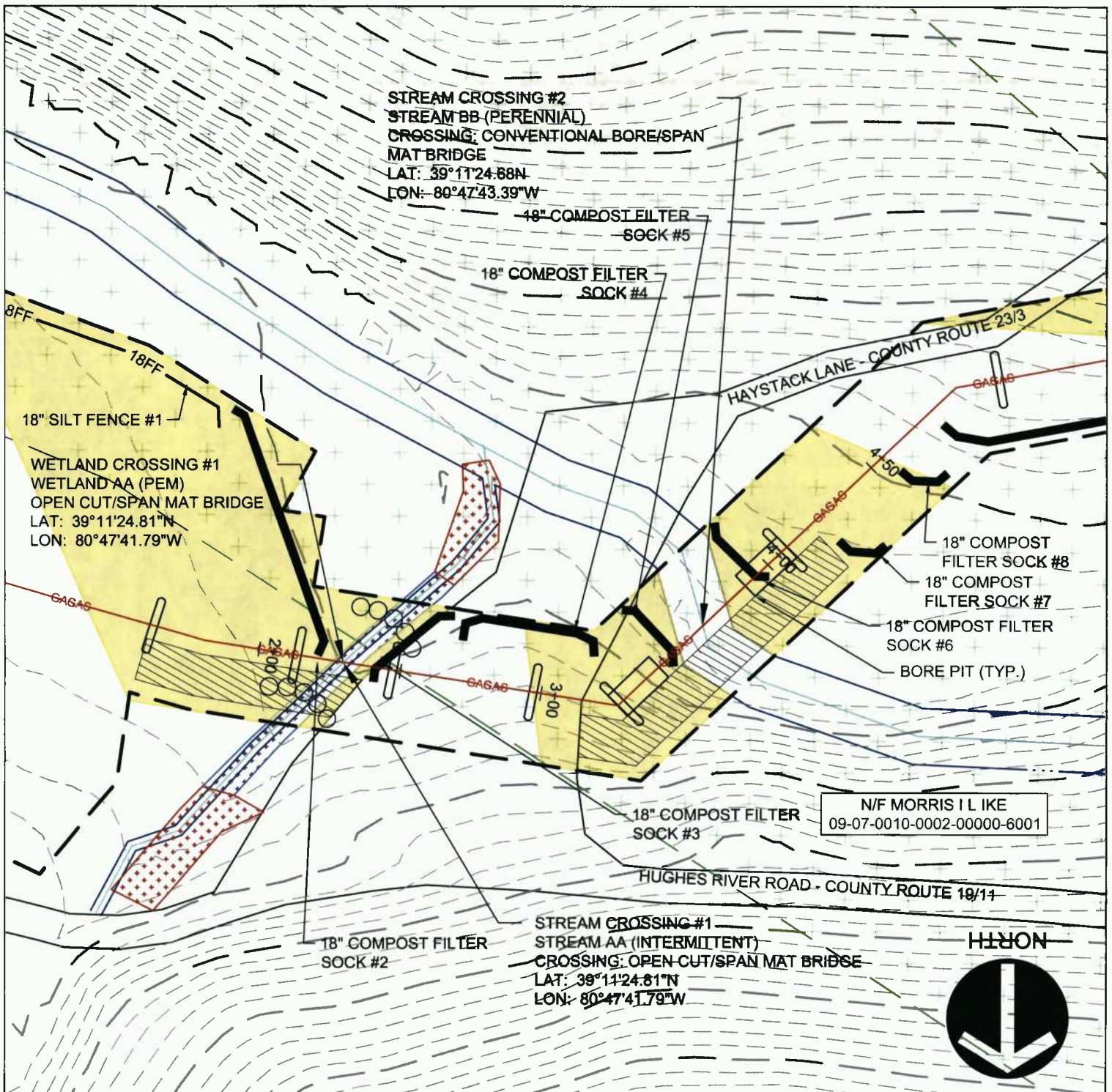
MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

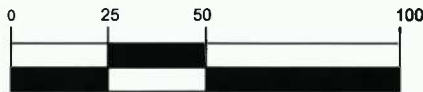
Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855.634.9284



GRAPHIC SCALE



(IN FEET)

1 inch = 50 ft.

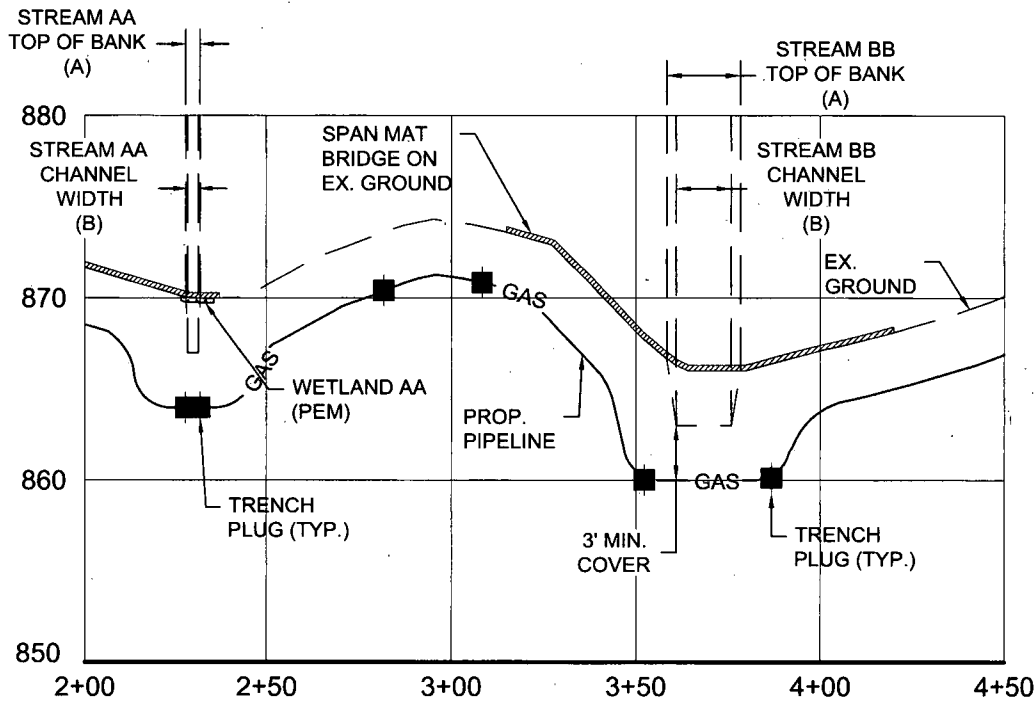
STREAM CROSSING #1
 PLAN
 Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN 2016
 Index Number:
 Drawn By: TJS
 Checked By: DMH
 Project Manager: DMH
APPENDIX C

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA
 PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

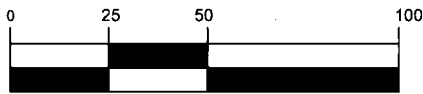
Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #1
PROFILE

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN. 2016
Index Number:
Drawn By: TJS
Checked By: DMH
Project Manager: DMH

APPENDIX C

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

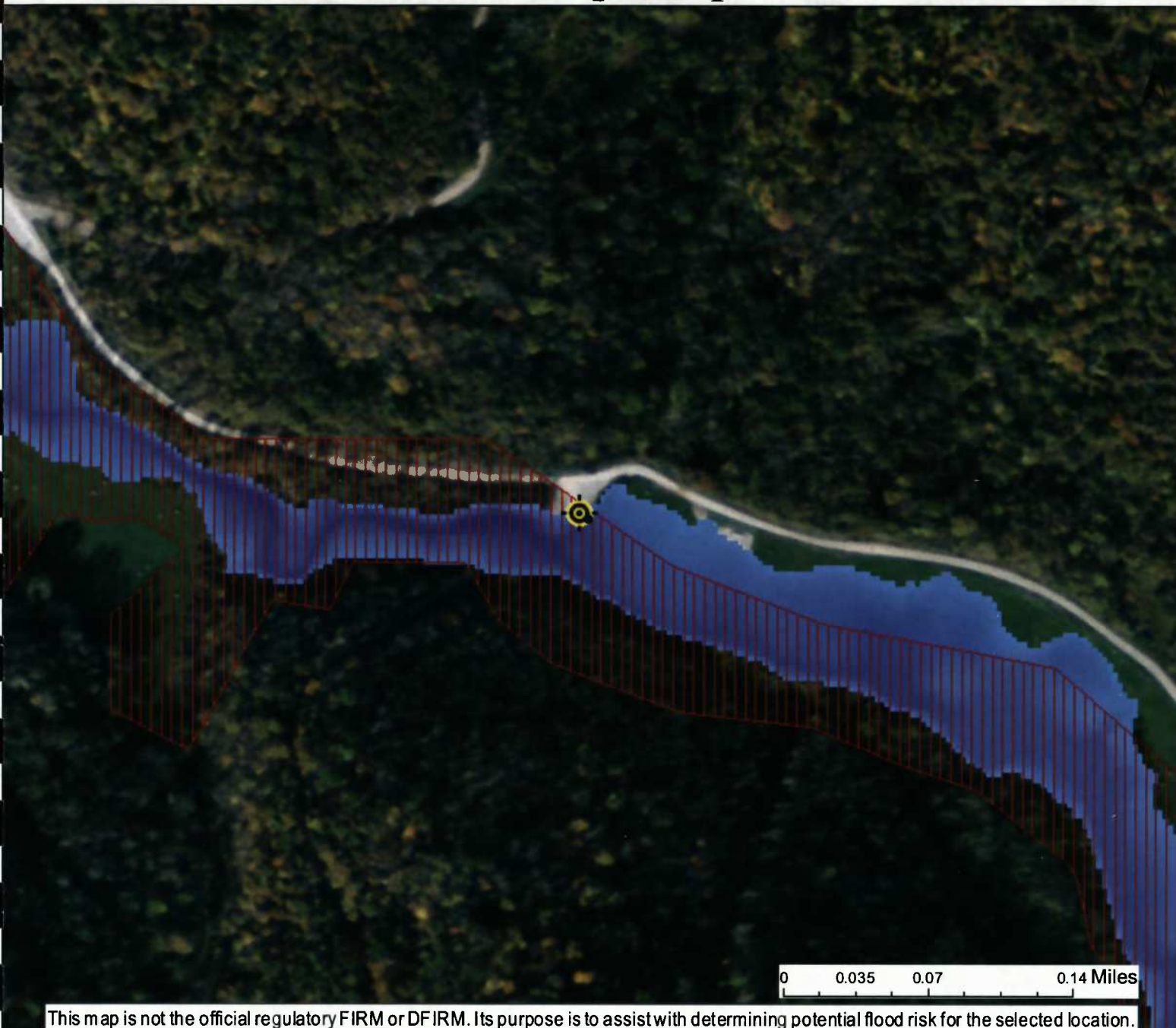
Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY[®]

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map - Impact 1



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Stream Crossing #1</p>	<p style="text-align: right;"><i>Map created on January 7, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: South Fork Hughes River</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Kanawha (5030203)</p> <p>Advisory Flood Height: About 876 ft</p> <p>Water Depth: About 1.4 ft (Source: HEC_RA)</p> <p>Elevation: About 873 ft</p> <p>Location (long, lat): (80.795017 W, 39.190262 N)</p> <p>Location (UTM 17N): (517703, 4337910)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: South Fork Hughes River</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

APPENDIX D

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 2

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 2 of 10

Site/Property Information:		
Legal Description: Large Forested Commercial Lot (Stream Crossing #2)		
Physical Address/911 Address: Parcel Tax ID: 7-10-2		
Decimal Latitude/Longitude: 39.190189 N / 80.795388 W		
DMS Latitude/Longitude: 39° 11' 24.68" N / 80° 47' 43.39" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Commercial Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 2 of 10

Property Owner Data:		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

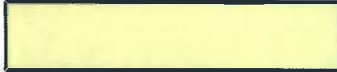











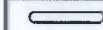
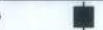

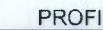


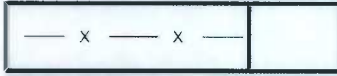



Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): May Revocable Trust		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): CNG Transmission Corp		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: 18422-0011
 Drawing Scale: 1"=1'-0"
 Date issued: JAN 30 2018
 Index Number:
 Drawn By: JUS
 Checked By: DMH
 Project Manager: DMH

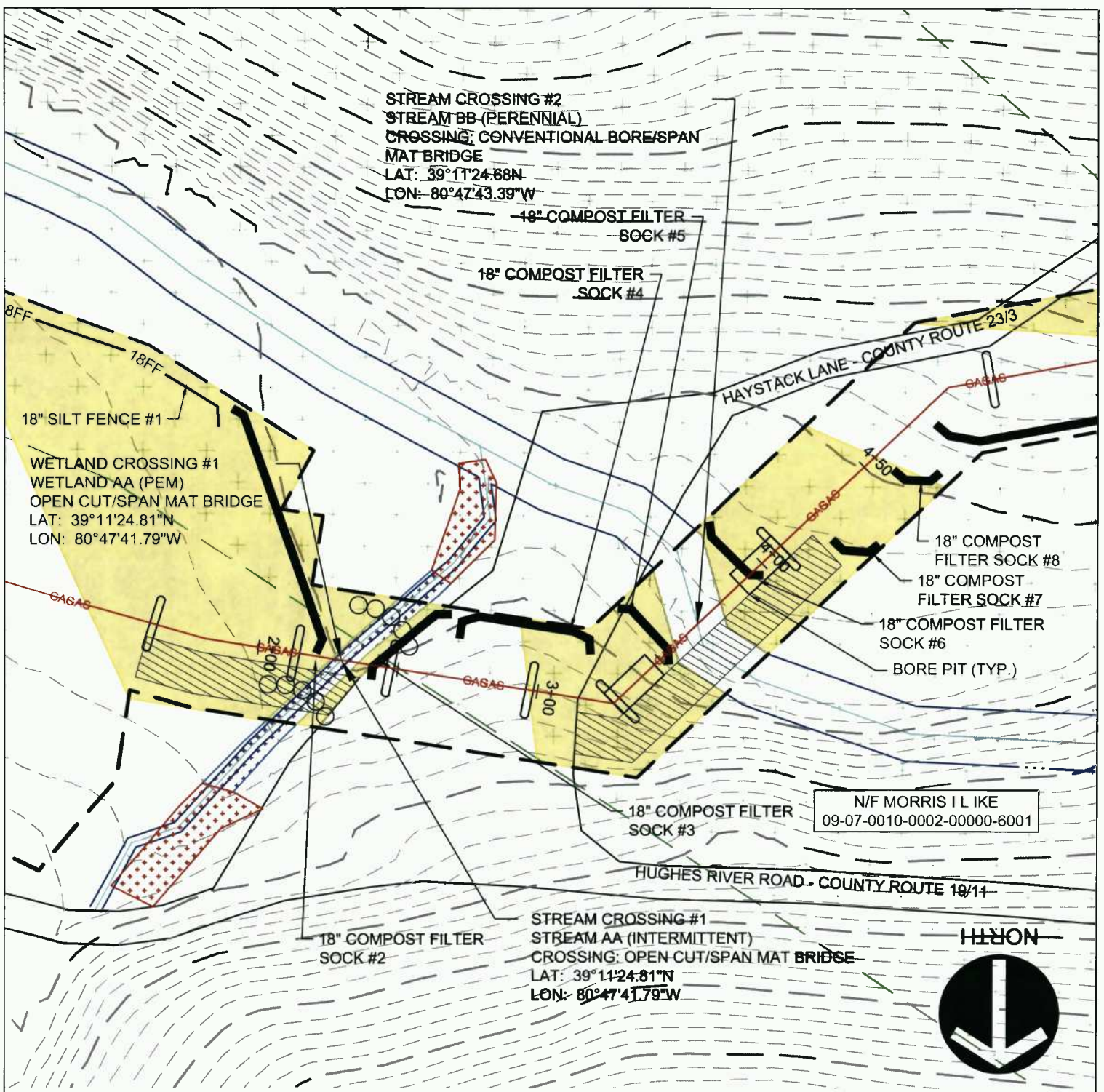
MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



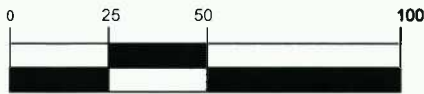
GATEWAY®
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



N/F MORRIS I L IKE
09-07-0010-0002-00000-6001



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #2
PLAN
Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2016
Index Number:
Drawn By: TJS
Checked By: DMH
Project Manager: DMH

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

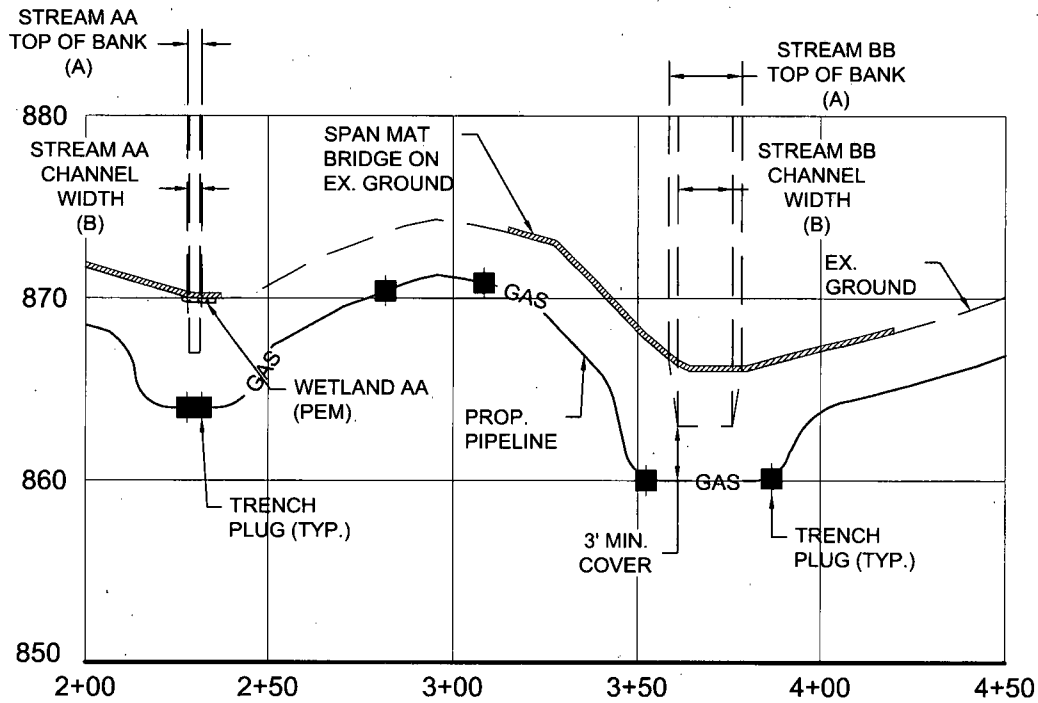
PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

© Gateway Engineers Inc. All Rights Reserved



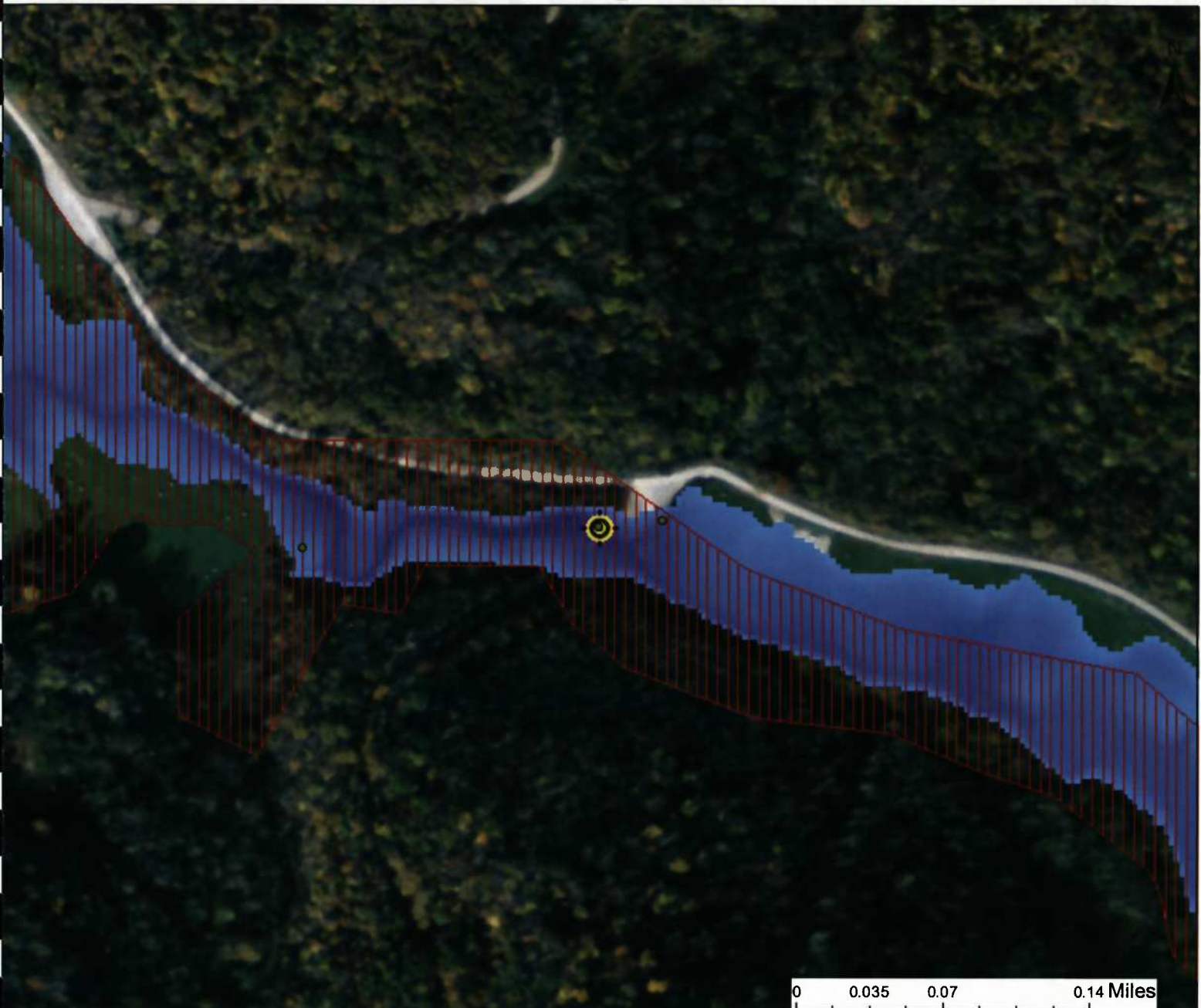
GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

<p>STREAM CROSSING #2 PROFILE</p> <p>Project Number: 18422-0011 Drawing Scale: 1"=50' Date Issued: JAN 2016 Index Number: Drawn By: JUS Checked By: DMH Project Manager: DMH</p> <p>APPENDIX D</p>	<p>MOSA S033 PIPELINE DODDRIDGE COUNTY, WEST VIRGINIA</p> <p>PREPARED FOR: EQM GATHERING OPCO, LLC 625 LIBERTY AVENUE PITTSBURGH, PENNSYLVANIA, 15222</p>	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th>Date</th> <th>No</th> <th>REVISION RECORD</th> </tr> </thead> <tbody> <tr><td>-</td><td>01</td><td>-</td></tr> <tr><td>-</td><td>02</td><td>-</td></tr> <tr><td>-</td><td>03</td><td>-</td></tr> <tr><td>-</td><td>04</td><td>-</td></tr> <tr><td>-</td><td>05</td><td>-</td></tr> <tr><td>-</td><td>06</td><td>-</td></tr> <tr><td>-</td><td>07</td><td>-</td></tr> <tr><td>-</td><td>08</td><td>-</td></tr> </tbody> </table>	Date	No	REVISION RECORD	-	01	-	-	02	-	-	03	-	-	04	-	-	05	-	-	06	-	-	07	-	-	08	-	<div style="text-align: center;"> <p>GATEWAY®</p> <p>The Gateway Engineers, Inc. Full-Service Civil Engineering & Surveying Pittsburgh, PA</p> <p>gatewayengineers.com 855-634-9284</p> </div>
Date	No	REVISION RECORD																												
-	01	-																												
-	02	-																												
-	03	-																												
-	04	-																												
-	05	-																												
-	06	-																												
-	07	-																												
-	08	-																												

WV Flood Map Impact 2



0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 2</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: South Fork Hughes River</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Kanawha (5030203)</p> <p>Advisory Flood Height: About 875 ft</p> <p>Water Depth: About 9.6 ft (Source: HEC_RA)</p> <p>Elevation: About 866 ft</p> <p>Location (long, lat): (80.795388 W, 39.190189 N)</p> <p>Location (UTM 17N): (517670, 4337902)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: South Fork Hughes River</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

APPENDIX E

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 3

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 3 of 10

Site/Property Information:		
Legal Description: Large Forested Commercial Lot (Stream Crossing #3)		
Physical Address/911 Address: Parcel Tax ID: 7-10-2		
Decimal Latitude/Longitude: 39.190078 N / 80.797431 W		
DMS Latitude/Longitude: 39° 11' 24.28" N / 80° 47' 50.75" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Commercial Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 3 of 10

Property Owner Data:		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.









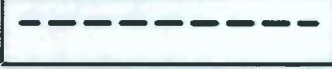
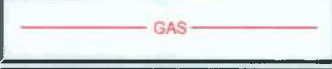
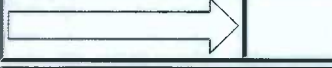






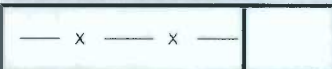

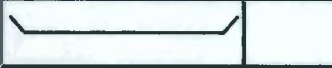


Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Robert Brannon ETAL		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Lucy E Harper		
Physical Address: 511 Boca Ciega Point Blvd N		
City: St. Petersburg	State: FL	Zip: 33708
PO Primary Phone: 727-398-6311		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  90B MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: 18422-0011
 Drawing Scale: 1" = 10'
 Date Issued: JAN 2018
 Index Number:
 Drawn By: JCS
 Checked By: BMR
 Project Manager: BMR

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

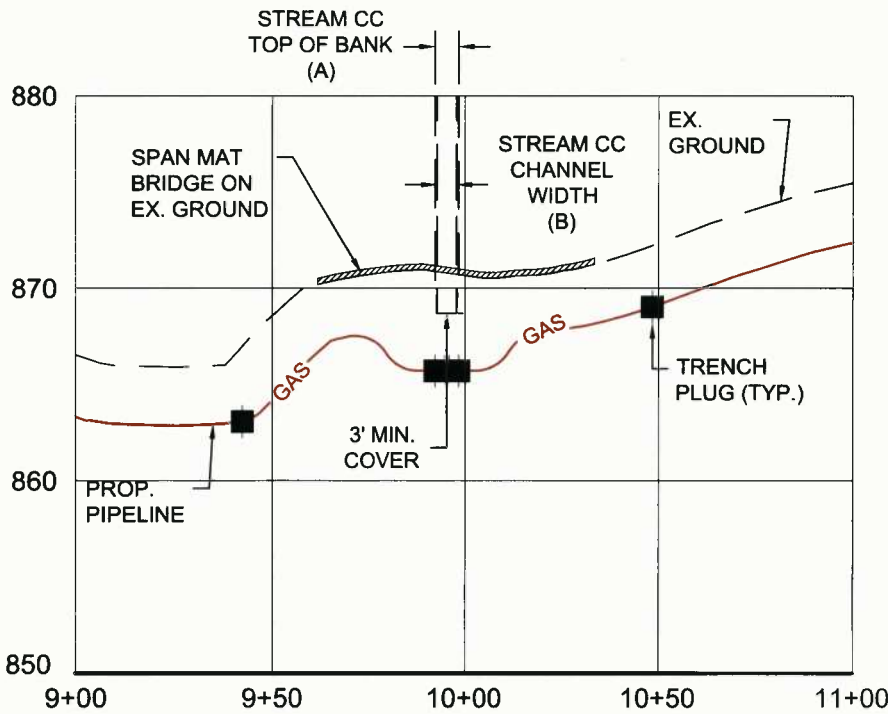
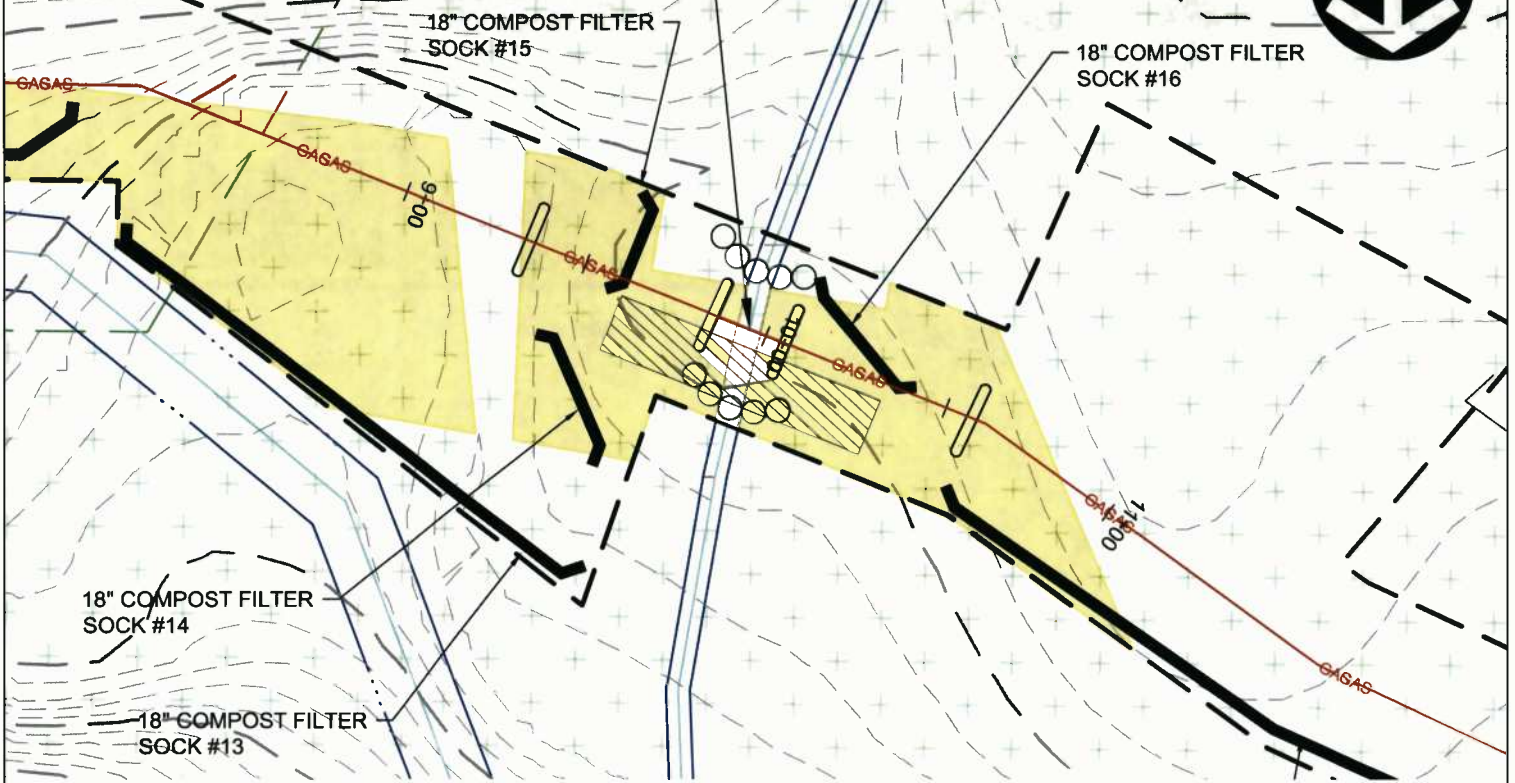


GATEWAY®
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9264

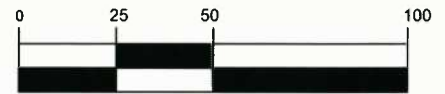
STREAM CROSSING #3
 STREAM CC (INTERMITTENT)
 CROSSING: OPEN CUT/SPAN MAT BRIDGE
 LAT: 39°11'24.28N
 LON: 80°47'50.75"W

N/F MORRIS I L I K E
 09-07-0010-0002-00000-6001

NORTH



GRAPHIC SCALE



(IN FEET)
 1 inch = 50 ft.

STREAM CROSSING #3
 PLAN AND PROFILE
 Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN 2018
 Index Number:
 Drawn By: TJS
 Checked By: DMH
 Project Manager: DMH

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-8284

© Gateway Engineers Inc. All Rights Reserved

WV Flood Map Impact 3



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 3</p>	<p>Map created on January 8, 2016</p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: South Fork Hughes River</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Kanawha (5030203)</p> <p>Advisory Flood Height: About 872 ft</p> <p>Water Depth: About 1.2 ft (Source: HEC_RA)</p> <p>Elevation: About 871 ft</p> <p>Location (long, lat): (80.797431 W, 39.190078 N)</p> <p>Location (UTM 17N): (517494, 4337889)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: South Fork Hughes River</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>			

APPENDIX F

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 4

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 4 of 10

Site/Property Information:		
Legal Description: Large Forested Commercial Lot (Stream Crossing #4)		
Physical Address/911 Address: Parcel Tax ID: 7-10-2		
Decimal Latitude/Longitude: 39.190844 N / 80.798776 W		
DMS Latitude/Longitude: 39° 11' 27.04" N / 80° 47' 55.59" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Commercial Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 4 of 10

Property Owner Data:		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

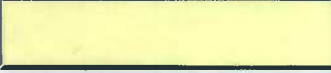





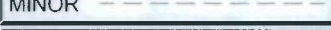














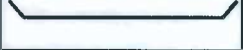
Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): May Revocable Trust		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): CNG Transmission		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: 18422-0011
 Drawing Scale: 1"=15'
 Date Issued: JAN 2016
 Index Number:
 Drawn By: J.S.
 Checked By: DMH
 Project Manager: DMH

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

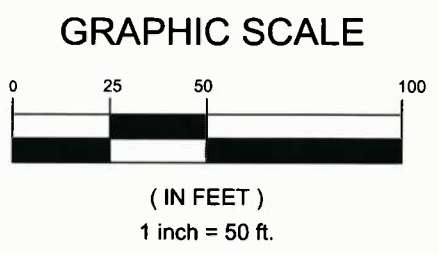
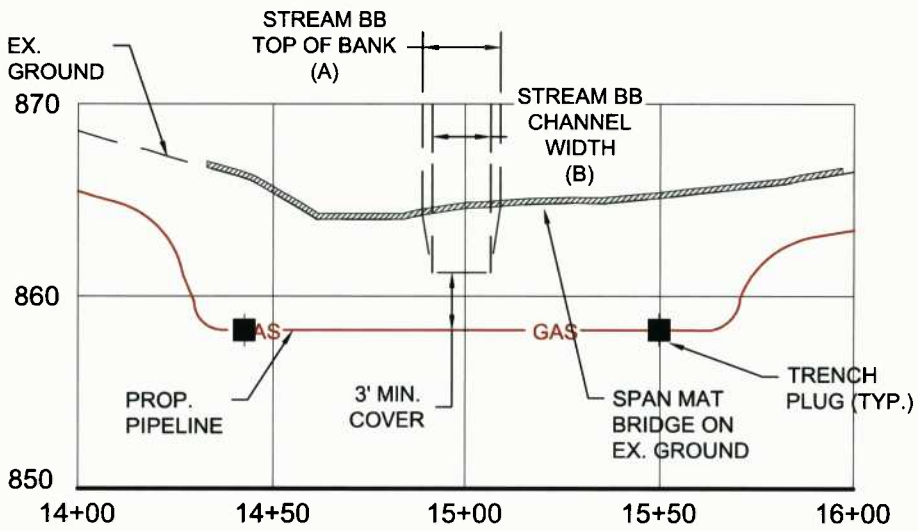
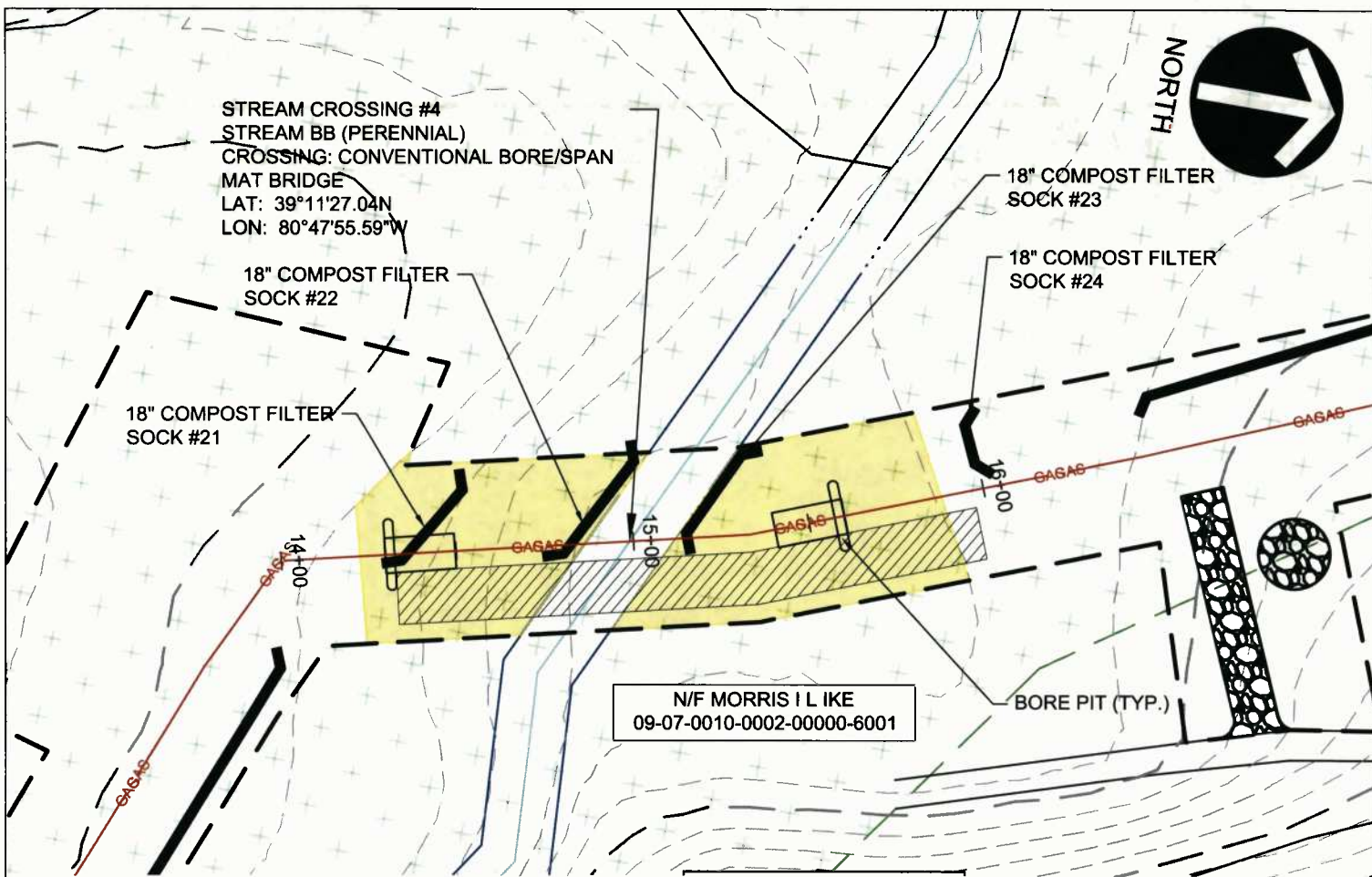
PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

LEGEND

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



STREAM CROSSING #4
PLAN AND PROFILE

Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN 2016
 Index Number:
 Drawn By: TJS
 Checked By: DMH
 Project Manager: DMH

APPENDIX F

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map Impact 4



0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 4</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: South Fork Hughes River</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Kanawha (5030203)</p> <p>Advisory Flood Height: About 869 ft</p> <p>Water Depth: About 4.4 ft (Source: HEC_RA)</p> <p>Elevation: About 865 ft</p> <p>Location (long, lat): (80.798776 W, 39.190844 N)</p> <p>Location (UTM 17N): (517378, 4337973)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: South Fork Hughes River</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

APPENDIX G

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 5

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 5 of 10

Site/Property Information:		
Legal Description: Large Forested Commercial Lot (Stream Crossing #5)		
Physical Address/911 Address: Parcel Tax ID: 7-10-2		
Decimal Latitude/Longitude: 39.192111 N / 80.799634 W		
DMS Latitude/Longitude: 39° 11' 31.60" N / 80° 47' 58.68" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Commercial Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 5 of 10

Property Owner Data:		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

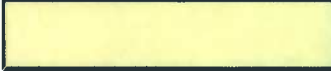


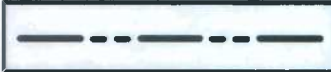
















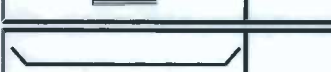

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Kermit G Jr and Helen D Hines		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Kermit G Jr and Helen D Hines		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: 18422-0011
 Drawing Scale: 1" = 15'
 Date issued: JAN 2018
 Index Number:
 Drawn By:
 Checked By:
 Project Manager:

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

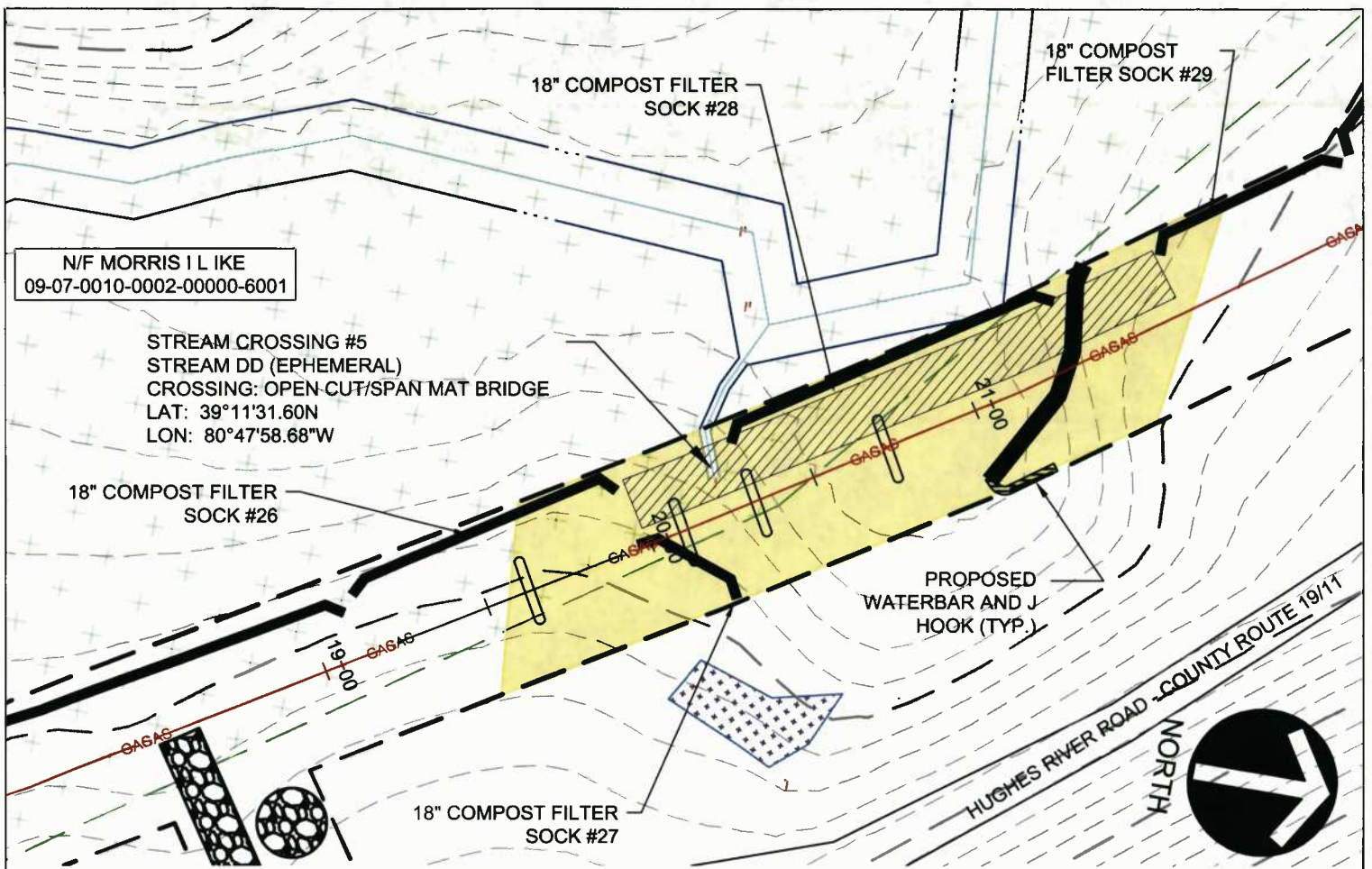
PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	



GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

LEGEND



N/F MORRIS I L I K E
09-07-0010-0002-00000-6001

STREAM CROSSING #5
STREAM DD (EPHEMERAL)
CROSSING: OPEN-CUT/SPAN MAT BRIDGE
LAT: 39°11'31.60N
LON: 80°47'58.68"W

18" COMPOST FILTER SOCK #26

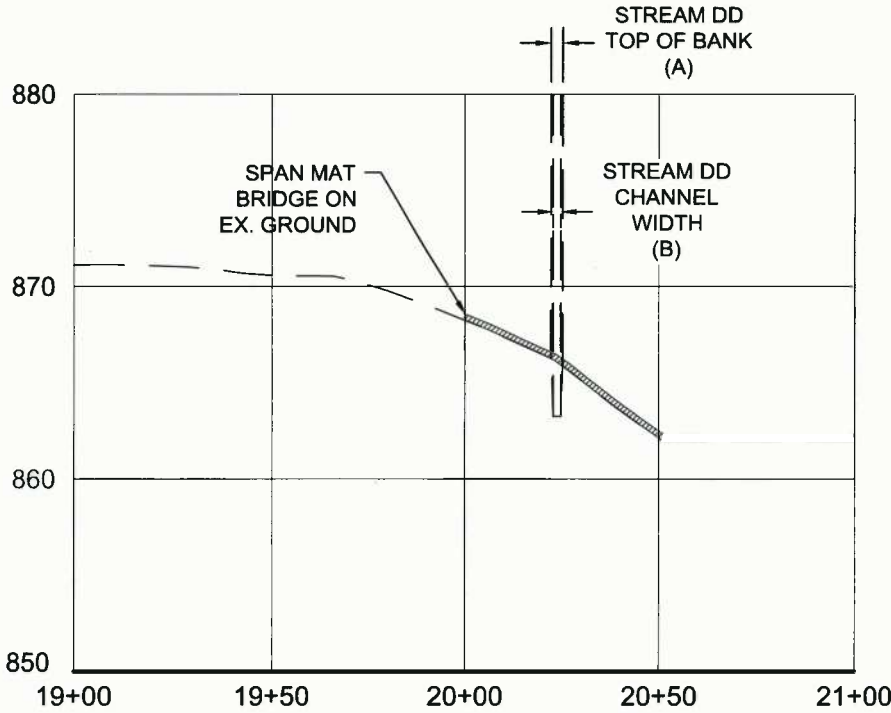
18" COMPOST FILTER SOCK #28

18" COMPOST FILTER SOCK #29

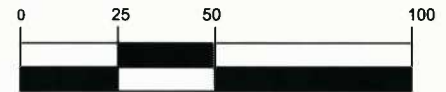
PROPOSED WATERBAR AND J-HOOK (TYP.)

HUGHES RIVER ROAD - COUNTY ROUTE 191T
NORTH

18" COMPOST FILTER SOCK #27



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #5 PLAN AND PROFILE
Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2018
Index Number:
Drawn By: TJS
Checked By: DMH
Project Manager: DMH

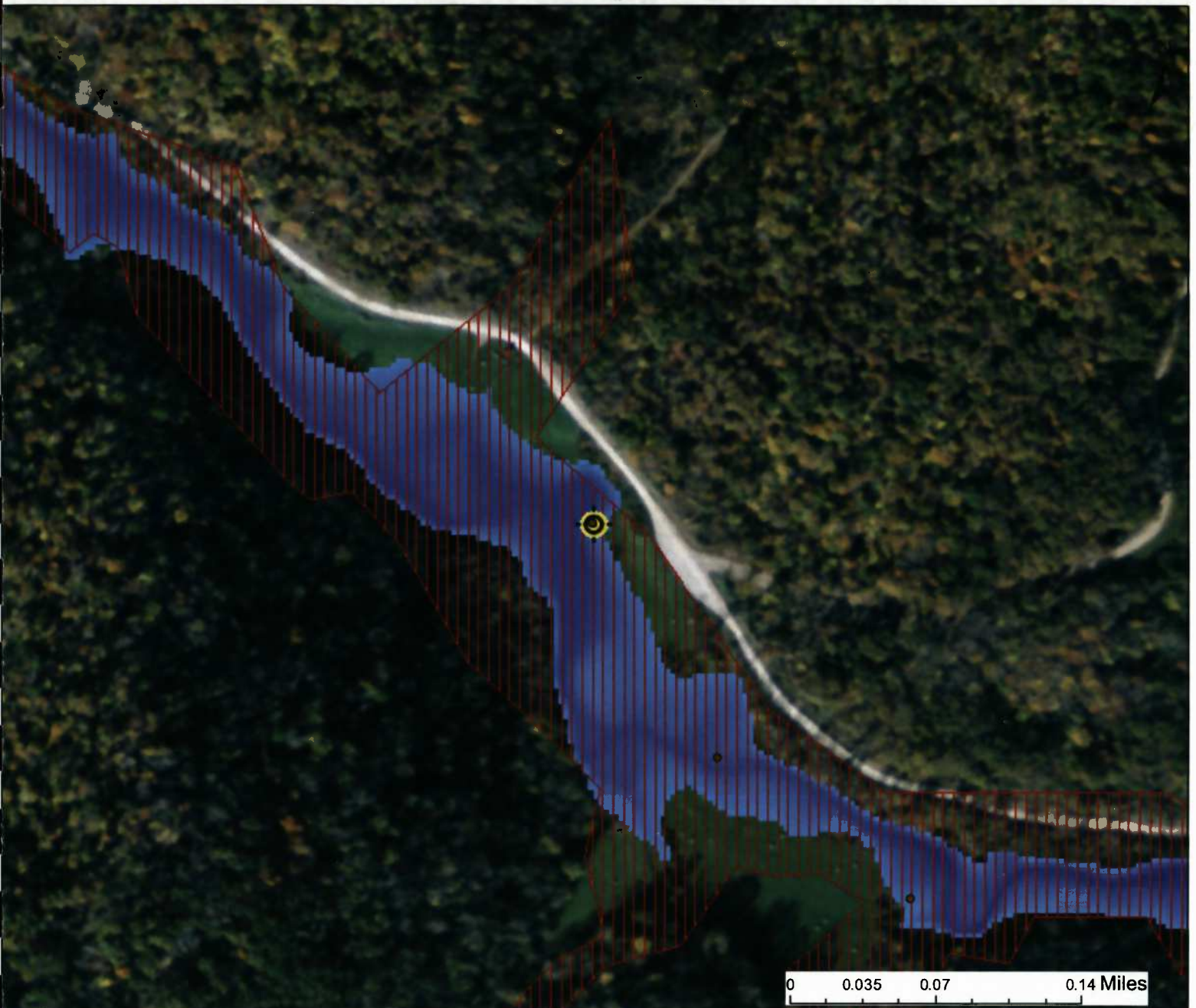
MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	06	-
-	08	-
-	07	-
-	08	-

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-8284

WV Flood Map Impact 5



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool</i> (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>		<p> Location of flood information</p> <p>User Notes: Impact 5</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: South Fork Hughes River</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Kanawha (5030203)</p> <p>Advisory Flood Height: About 869 ft</p> <p>Water Depth: About 3.8 ft (Source: HEC_RA)</p> <p>Elevation: About 865 ft</p> <p>Location (long, lat): (80.799634 W, 39.192111 N)</p> <p>Location (UTM 17N): (517303, 4338114)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: South Fork Hughes River</p> <p>Parcel Number:</p>
--	--	--	--

APPENDIX H

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 6

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 6 of 10

Site/Property Information:		
Legal Description: Large Forested Commercial Lot (Stream Crossing #6)		
Physical Address/911 Address: Parcel Tax ID: 7-10-2		
Decimal Latitude/Longitude: 39.192726 N / 80.800439 W		
DMS Latitude/Longitude: 39° 11' 33.81" N / 80° 48' 01.58" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Commercial Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 6 of 10

Property Owner Data:

Name of Primary Owner (PO): Ike Morris

PO Address: PO Box 397

City: Glenville

State: WV

Zip: 26351

PO Primary Phone: 304-347-1132

PO Secondary Phone:

PO Primary Email:

Surface Rights Owner Data:

Name of Primary Owner (PO): N/A

PO Address:

City:

State:

Zip:

PO Primary Phone:

PO Secondary Phone:

PO Primary Email:

Mineral Rights Owner Data: (As Applicable)

Name of Primary Owner (PO): N/A

PO Address:

City:

State:

Zip:

PO Primary Phone:

PO Secondary Phone:

PO Primary Email:

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

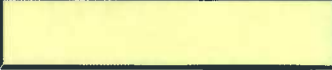






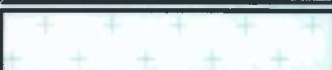
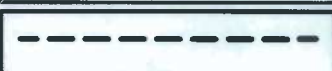







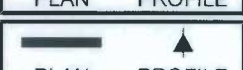





Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Justin L. Henderson Life Estate		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Robert Brannon ETAl		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: 18422-0011
 Drawing Scale: 1" = 5'
 Date issued: JAN, 2016
 Index Number:
 Drawn By: LJS
 Checked By: DMH
 Project Manager: DMH

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

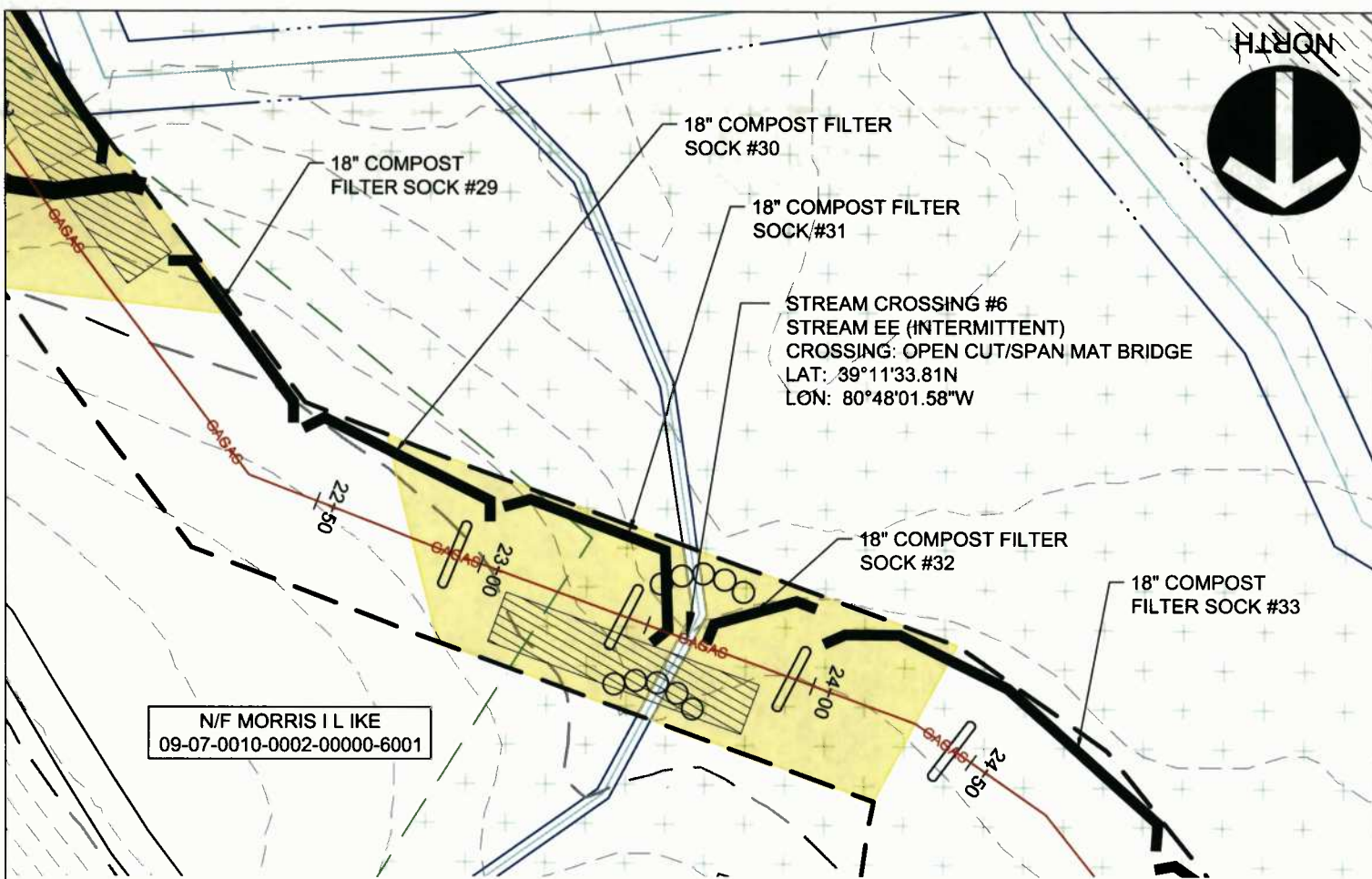
PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

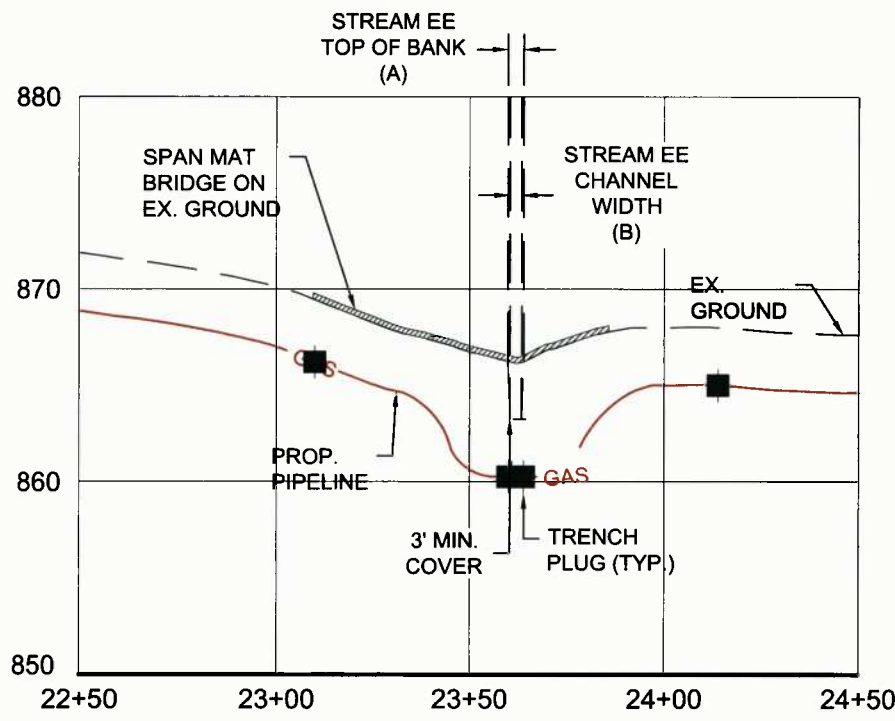


GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

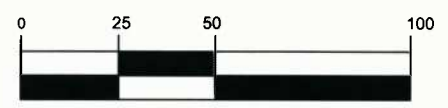
NORTH



N/F MORRIS I L I KE
09-07-0010-0002-00000-6001



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #6
PLAN AND PROFILE

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2016
Index Number:
Drawn By: JLS
Checked By: DMS
Project Manager: DMS

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY[®]

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284








© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map Impact 6



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

Map created on January 8, 2016

	Cross Section (XS) Lines		Location of flood information
	Base Flood Elevation (BFE) Lines	User Notes:	
	Floodway		Impact 6
Flood Hazard Zone			
	Approximate Study (Zone A)		
	Detailed Study (AE, AH, AO)		
	Community Rating System Areas		
Disclaimer:			
The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov . <i>WV Flood Tool</i> (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.			

Flood Hazard Area:	
Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.	
Flood Hazard Zone:	A (Advisory A)
Stream:	South Fork Hughes River
FEMA Issued Flood Map:	54017C0225C
Watershed (HUC8):	Little Kanawha (5030203)
Advisory Flood Height:	About 869 ft
Water Depth:	About 3.1 ft (Source: HEC_RA)
Elevation:	About 866 ft
Location (long, lat):	(80.800439 W, 39.192726 N)
Location (UTM 17N):	(517234, 4338182)
Contacts:	Doddridge
CRS Information:	N/A
Flood Profile:	
HEC-RAS Model:	South Fork Hughes River
Parcel Number:	

APPENDIX I

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 7

**Doddridge County Commercial/Industrial
Floodplain Development Permit Application**

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 7 of 10

Site/Property Information:		
Legal Description: Large Forested Commercial Lot (Stream Crossing #7)		
Physical Address/911 Address: Parcel Tax ID: 7-10-2		
Decimal Latitude/Longitude: 39.193375 N / 80.802129 W		
DMS Latitude/Longitude: 39° 11' 36.15" N / 80° 48' 07.66" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Commercial Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 7 of 10

Property Owner Data:

Name of Primary Owner (PO): Ike Morris

PO Address: PO Box 397

City: Glenville

State: WV

Zip: 26351

PO Primary Phone: 304-347-1132

PO Secondary Phone:

PO Primary Email:

Surface Rights Owner Data:

Name of Primary Owner (PO): N/A

PO Address:

City:

State:

Zip:

PO Primary Phone:

PO Secondary Phone:

PO Primary Email:

Mineral Rights Owner Data: (As Applicable)

Name of Primary Owner (PO): N/A

PO Address:

City:

State:

Zip:

PO Primary Phone:

PO Secondary Phone:

PO Primary Email:

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

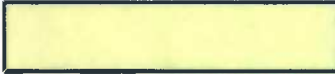


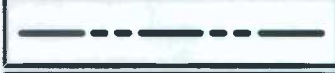





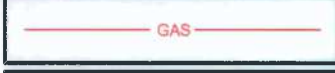
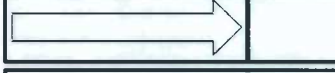





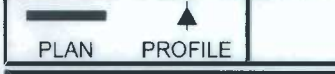





Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): May Revocable Trust		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): CNG Transmission		
Physical Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: 19422-0011
 Drawing Scale: 1" = 5'
 Date issued: JAN 30 2016
 Issue Number:
 Drawn By: LJS
 Checked By: DMH
 Project Manager: DMH

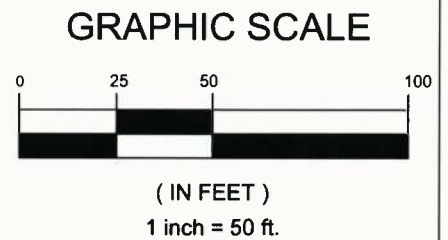
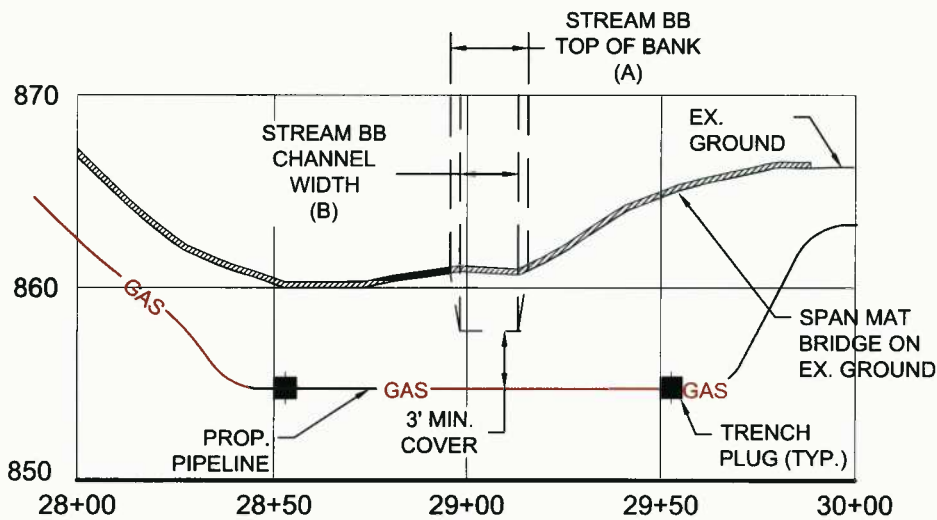
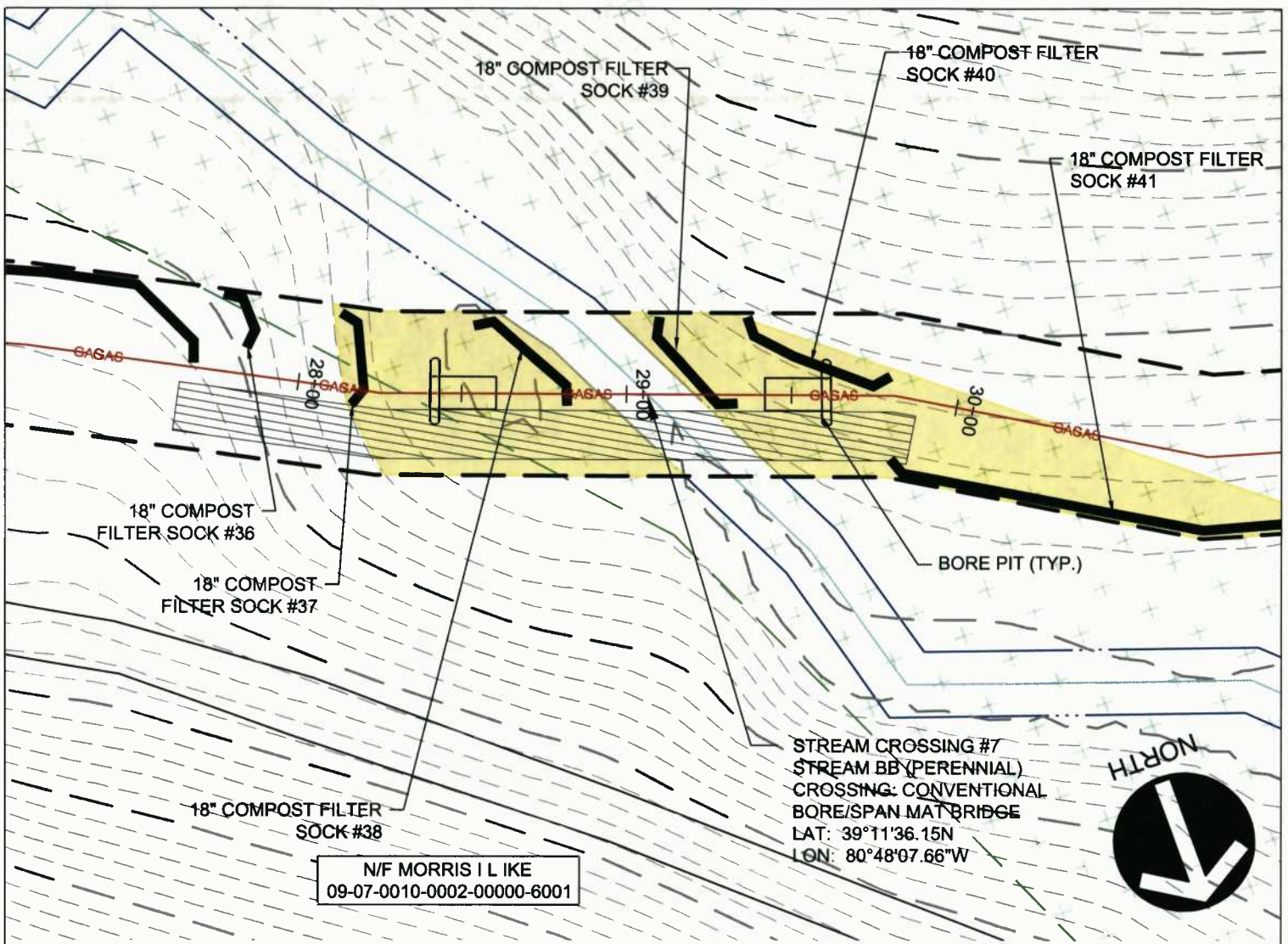
MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY®
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284



STREAM CROSSING #7
 PLAN AND PROFILE

Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN 2016
 Index Number:
 Drawn By: TJS
 Checked By: DMH
 Project Manager: DMH

APPENDIX I

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

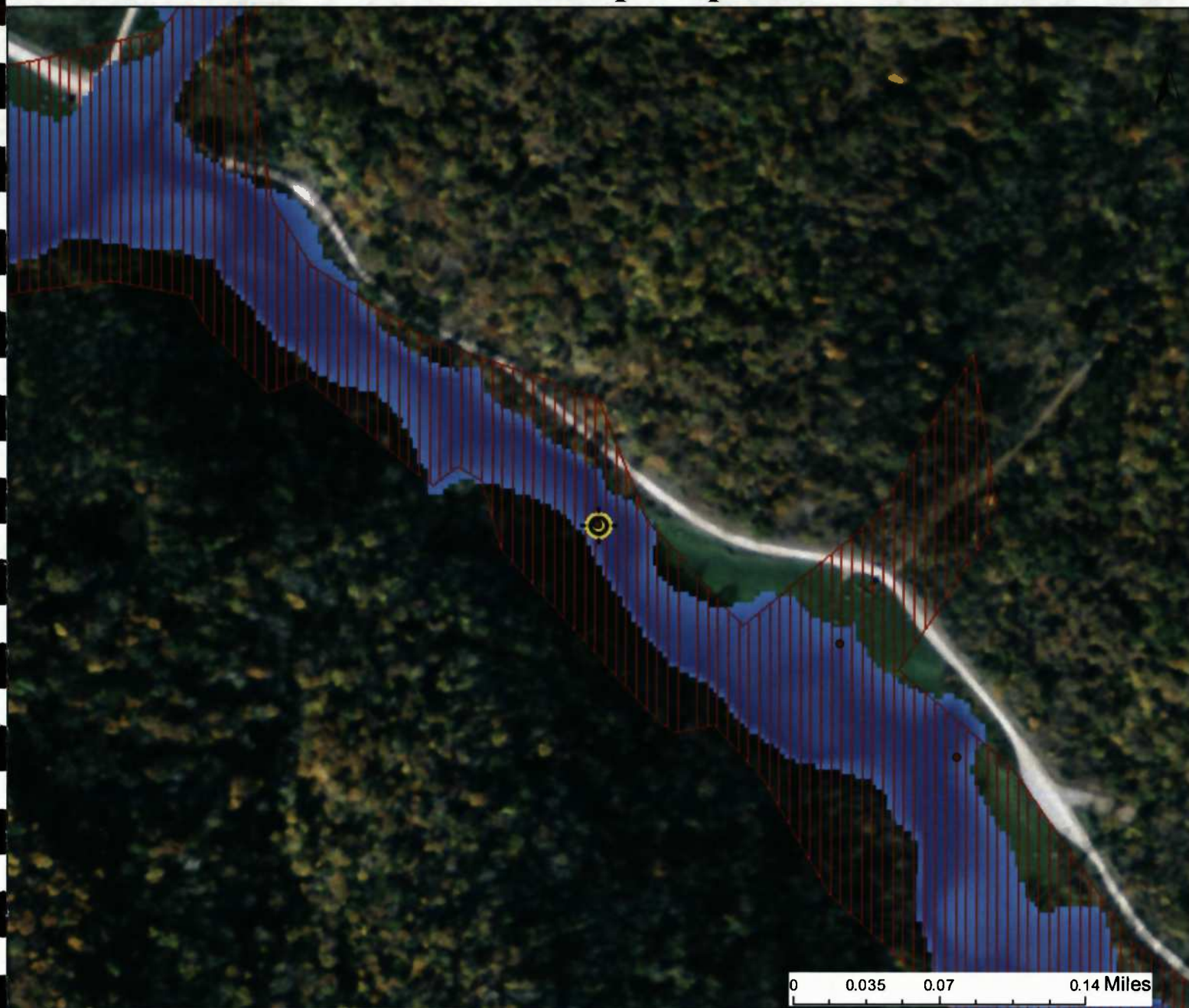
Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA

gatewayengineers.com 855-634-9284

WV Flood Map Impact 7



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 7</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: South Fork Hughes River</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Kanawha (5030203)</p> <p>Advisory Flood Height: About 868 ft</p> <p>Water Depth: About 7.6 ft (Source: HEC_RA)</p> <p>Elevation: About 860 ft</p> <p>Location (long, lat): (80.802129 W, 39.193375 N)</p> <p>Location (UTM 17N): (517088, 4338254)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: South Fork Hughes River</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

APPENDIX J

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 8

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 8 of 10

Site/Property Information:		
Legal Description: Large Forested Commercial Lot (Stream Crossing #8)		
Physical Address/911 Address: Parcel Tax ID: 7-10-2		
Decimal Latitude/Longitude: 39.194496 N / 80.804150 W		
DMS Latitude/Longitude: 39° 11' 40.18" N / 80° 48' 14.93" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Commercial Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 8 of 10

Property Owner Data:		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.




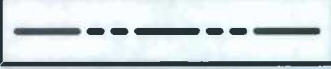




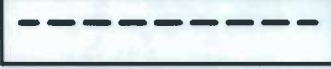
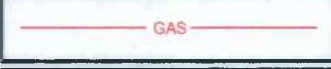












Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ike Morris		
Physical Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): May Revocable Trust		
Physical Address: N/A		
City:	State:	Zip:
PO Primary Phone: N/A		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ike Morris		
Physical Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): CNG Transmission		
Physical Address: N/A		
City:	State:	Zip:
PO Primary Phone: N/A		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: 18422-0011
 Drawing Scale: N.T.S.
 Date Issued: JAN 2018
 Index Number:
 Drawn By: JES
 Checked By: DMH
 Project Manager: DMH

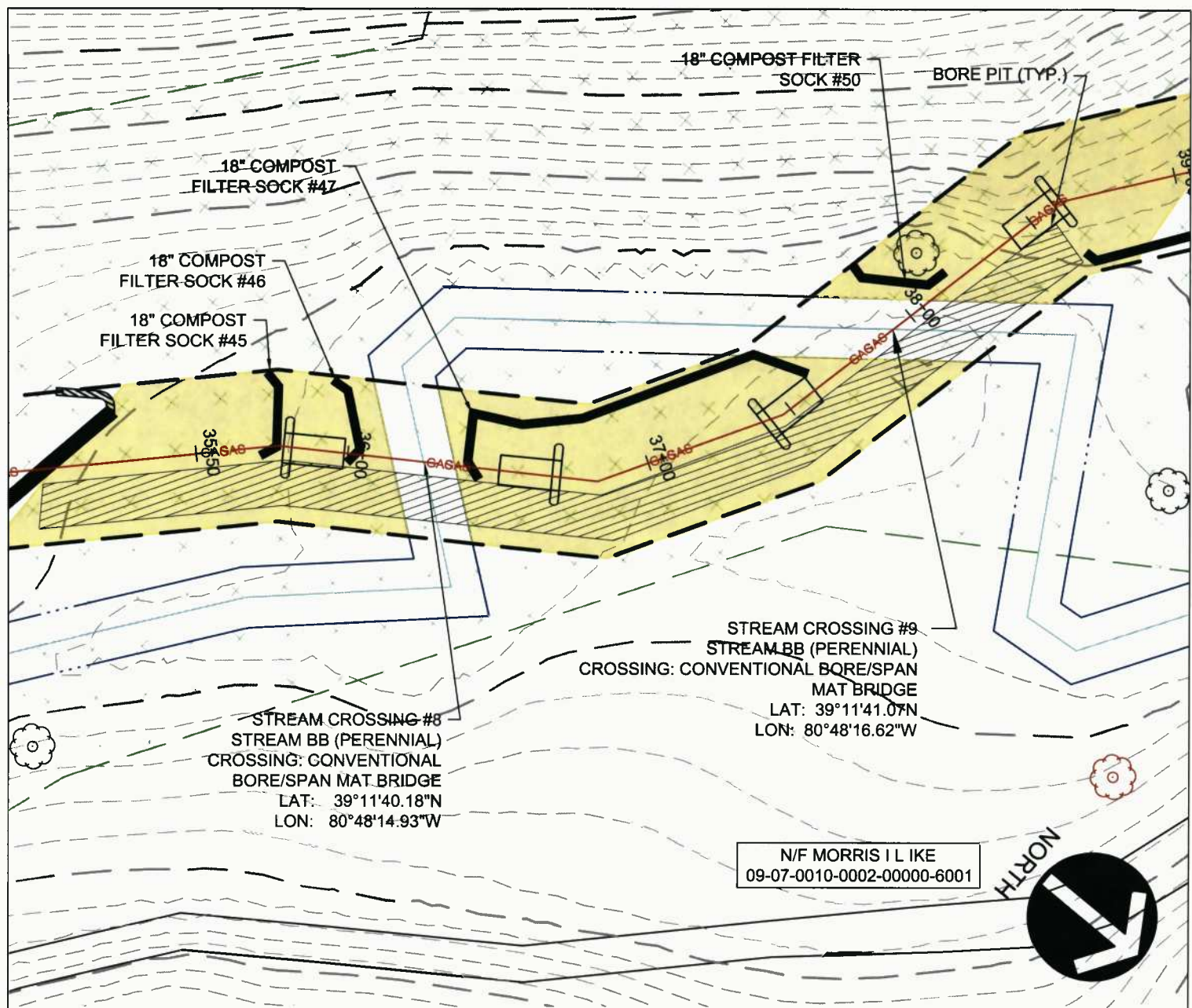
MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-6284



GRAPHIC SCALE



(IN FEET)
 1 inch = 50 ft.

STREAM CROSSING #8
 PLAN

Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN 2016
 Index Number:
 Drawn By: TJS
 Checked By: DMH
 Project Manager: DMH

APPENDIX J

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

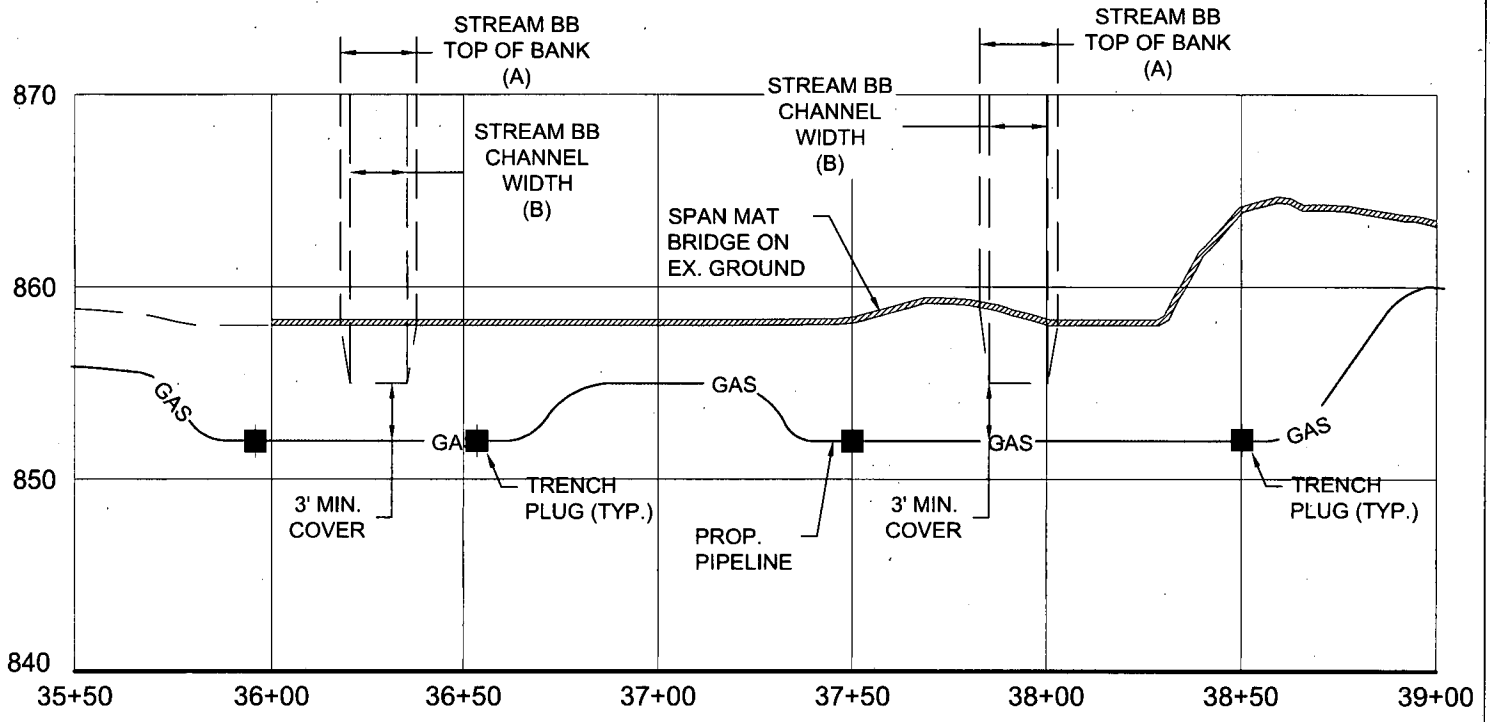
PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

 **GATEWAY®**

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 856-634-9284

© Gateway Engineers Inc. All Rights Reserved



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #8
PROFILE

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2018
Index Number:
Drawn By: TJS
Checked By: DMB
Project Manager: DMB

APPENDIX J

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

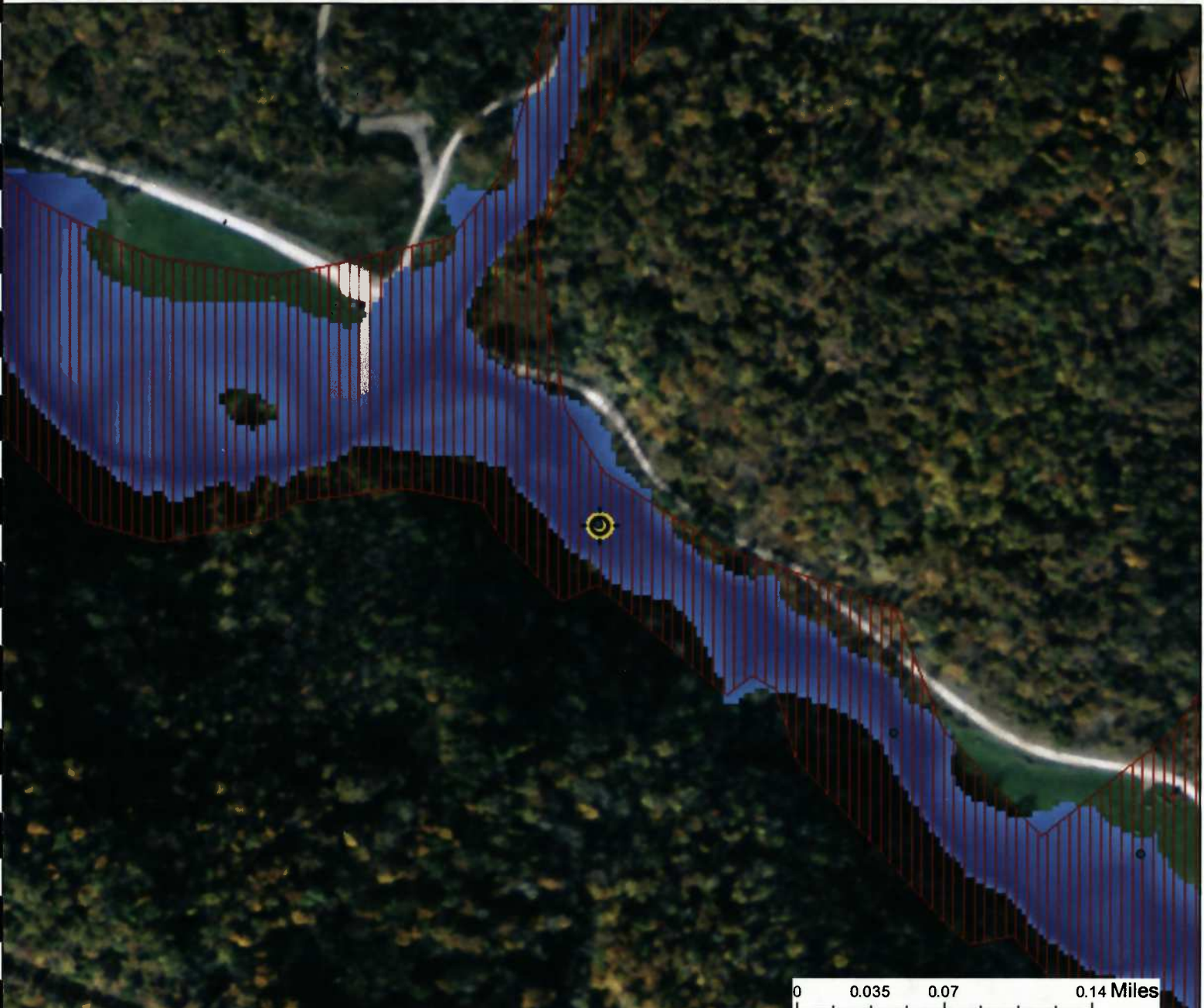
Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY[®]

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284








© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map Impact 8



0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

	Cross Section (XS) Lines		Location of flood information
	Base Flood Elevation (BFE) Lines	User Notes:	
	Floodway		Impact 8
Flood Hazard Zone			
	Approximate Study (Zone A)		
	Detailed Study (AE, AH, AO)		
	Community Rating System Areas		
Disclaimer:			
The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov . <i>WV Flood Tool</i> (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.			

Map created on January 8, 2016

Flood Hazard Area:	
Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.	
Flood Hazard Zone:	A (Advisory A)
Stream:	South Fork Hughes River
FEMA Issued Flood Map:	54017C0225C
Watershed (HUC8):	Little Kanawha (5030203)
Advisory Flood Height:	About 865 ft
Water Depth:	About 7.3 ft (Source: HEC_RA)
Elevation:	About 857 ft
Location (long, lat):	(80.804150 W, 39.194496 N)
Location (UTM 17N):	(516913, 4338378)
Contacts:	Doddridge
CRS Information:	N/A
Flood Profile:	
HEC-RAS Model:	South Fork Hughes River
Parcel Number:	

APPENDIX K

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 9

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 9 of 10

Site/Property Information:		
Legal Description: Large Forested Commercial Lot (Stream Crossing #9)		
Physical Address/911 Address: Parcel Tax ID: 7-10-2		
Decimal Latitude/Longitude: 39.194741 N / 80.804618 W		
DMS Latitude/Longitude: 39° 11' 41.07" N / 80° 48' 16.62" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Commercial Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 9 of 10

Property Owner Data:		
Name of Primary Owner (PO): Ike Morris		
PO Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Surface Rights Owner Data:		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Mineral Rights Owner Data: (As Applicable)		
Name of Primary Owner (PO): N/A		
PO Address:		
City:	State:	Zip:
PO Primary Phone:		
PO Secondary Phone:		
PO Primary Email:		

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.




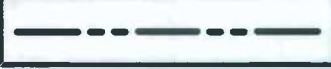





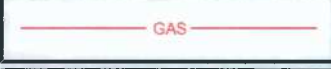
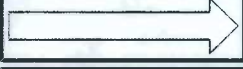











Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ike Morris		
Physical Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): May Revocable Trust		
Physical Address: N/A		
City:	State:	Zip:
PO Primary Phone: N/A		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ike Morris		
Physical Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): CNG Transmission		
Physical Address: N/A		
City:	State:	Zip:
PO Primary Phone: N/A		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: 18422-0011
 Drawing Scale: 1" = 5'
 Date Issued: JAN 2016
 Index Number:
 Drawn By: JLS
 Checked By: DMH
 Project Manager: DMH

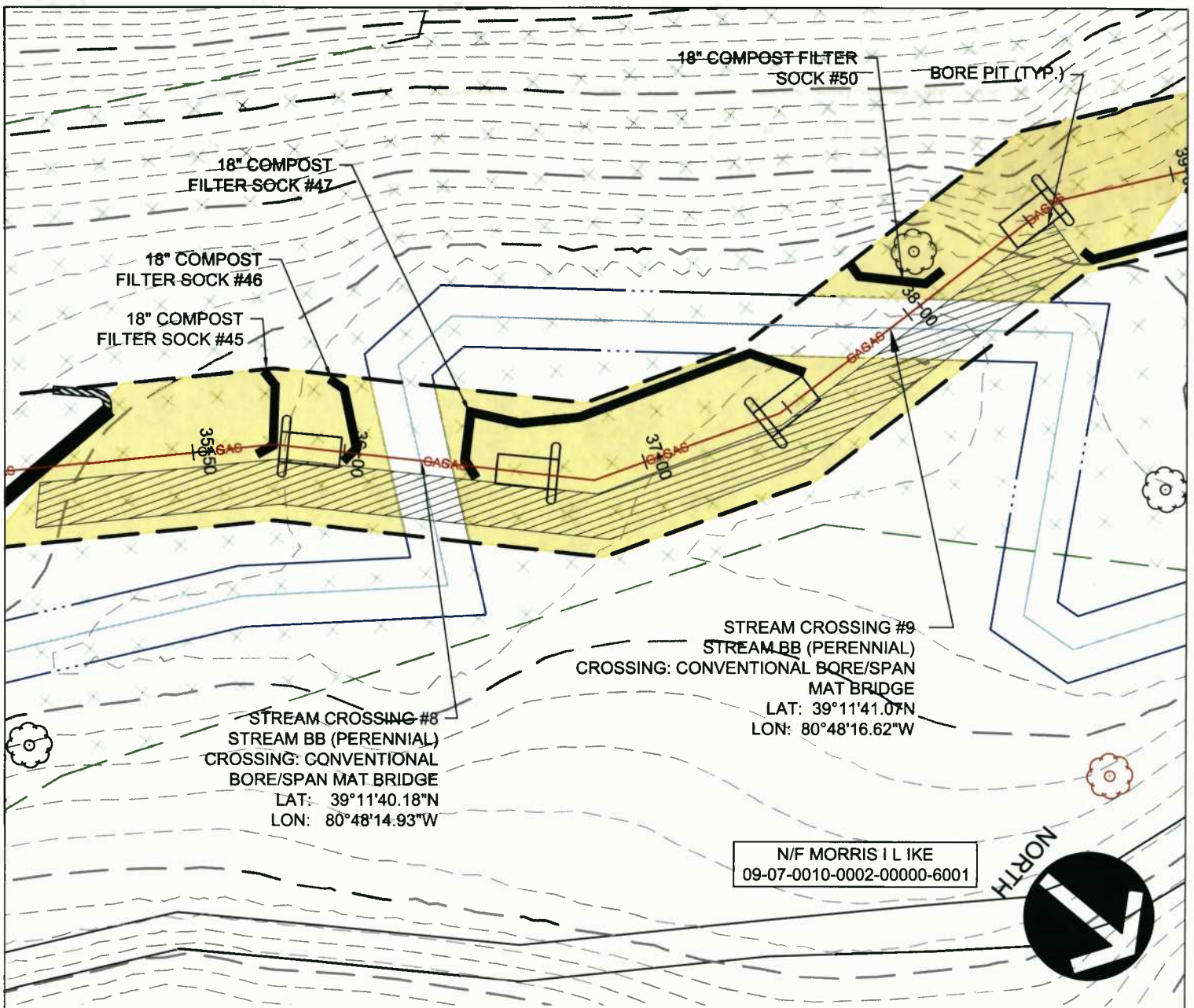
MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

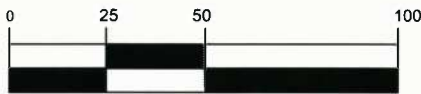
Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY®
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-6264

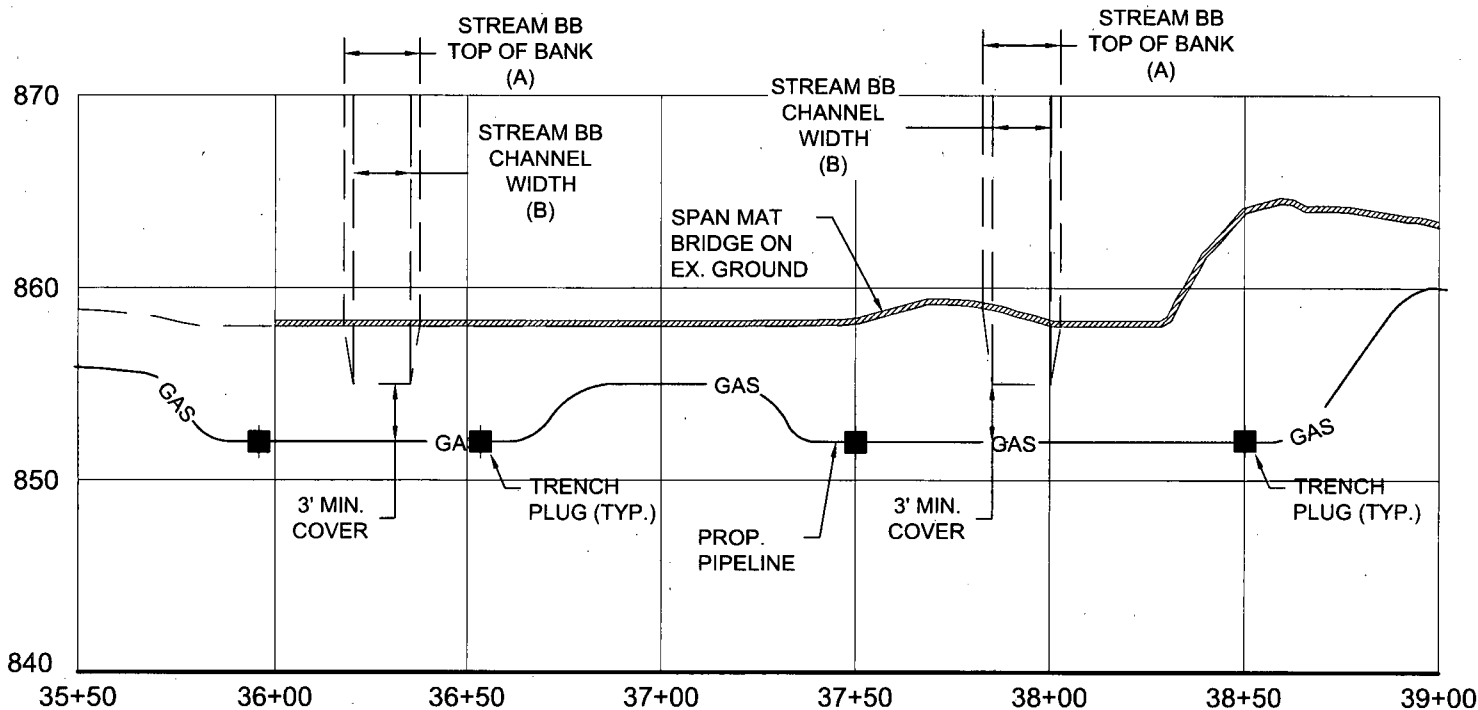


GRAPHIC SCALE

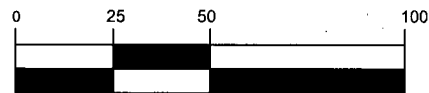


(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #8 PLAN Project Number: 18422-0011 Drawing Scale: 1"=50' Date Issued: JAN 2016 Index Number: Drawn By: TJS Checked By: DMB Project Manager: DMB	MOSA S033 PIPELINE DODDRIDGE COUNTY, WEST VIRGINIA	<table border="1"> <thead> <tr> <th>Date</th> <th>No.</th> <th>REVISION RECORD</th> </tr> </thead> <tbody> <tr><td>-</td><td>01</td><td></td></tr> <tr><td>-</td><td>02</td><td></td></tr> <tr><td>-</td><td>03</td><td></td></tr> <tr><td>-</td><td>04</td><td></td></tr> <tr><td>-</td><td>05</td><td></td></tr> <tr><td>-</td><td>06</td><td></td></tr> <tr><td>-</td><td>07</td><td></td></tr> <tr><td>-</td><td>08</td><td></td></tr> </tbody> </table>	Date	No.	REVISION RECORD	-	01		-	02		-	03		-	04		-	05		-	06		-	07		-	08		<p>GATEWAY The Gateway Engineers, Inc. Full-Service Civil Engineering & Surveying Pittsburgh, PA gatewayengineers.com 855-634-9284</p>
	Date		No.	REVISION RECORD																										
-	01																													
-	02																													
-	03																													
-	04																													
-	05																													
-	06																													
-	07																													
-	08																													
APPENDIX K PREPARED FOR: EQM GATHERING OPCO, LLC 625 LIBERTY AVENUE PITTSBURGH, PENNSYLVANIA, 15222																														



GRAPHIC SCALE



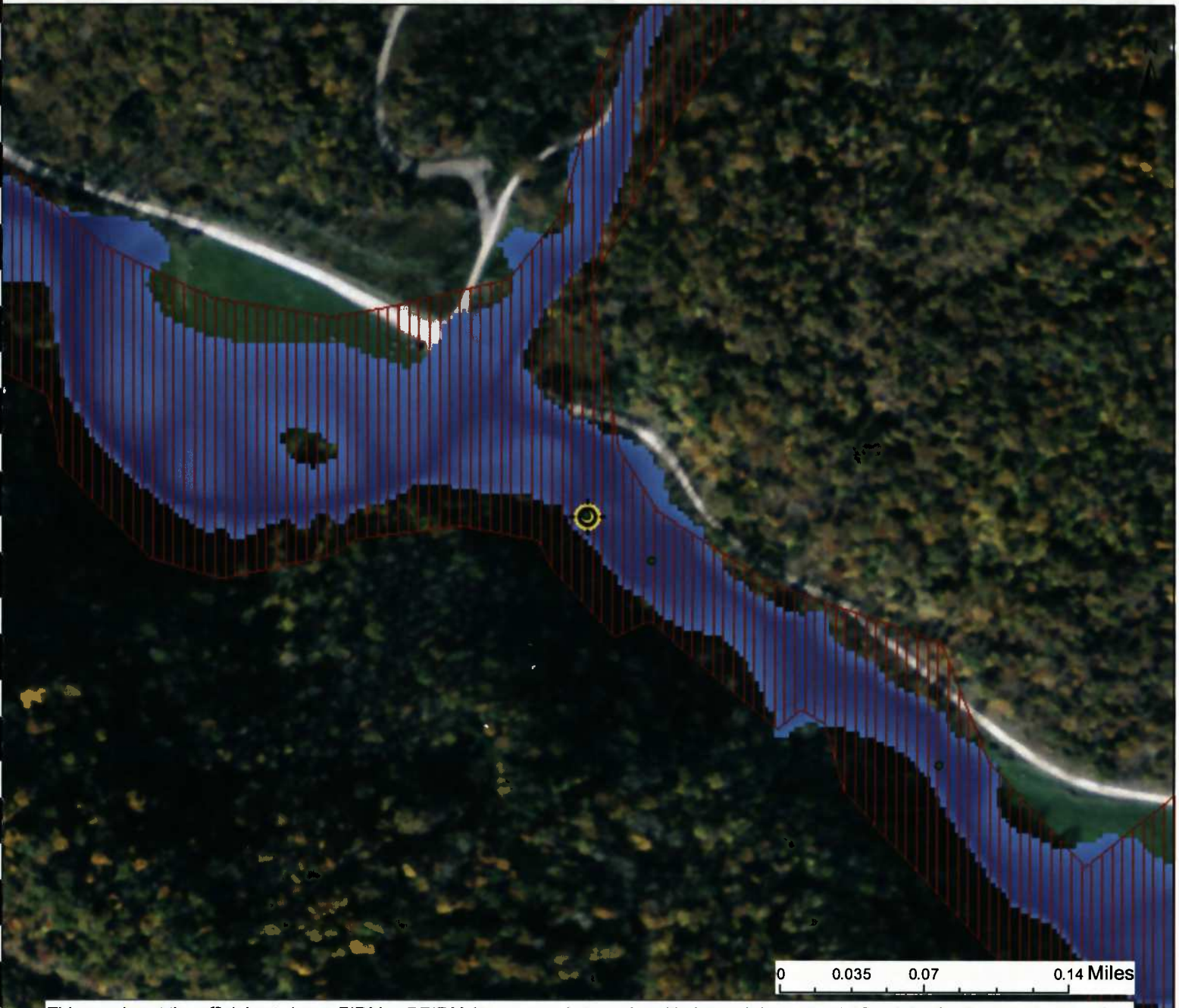
(IN FEET)
1 inch = 50 ft.

<p>STREAM CROSSING #9 PROFILE</p> <p>Project Number: 18422-0011 Drawing Scale: 1"=50' Date Issued: JAN. 2018 Index Number: Drawn By: TJS Checked By: DMH Project Manager: DMH</p>	<p>MOSA S033 PIPELINE DODDRIDGE COUNTY, WEST VIRGINIA</p> <p>PREPARED FOR: EQM GATHERING OPCO, LLC 625 LIBERTY AVENUE PITTSBURGH, PENNSYLVANIA, 15222</p>	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th colspan="2">REVISION RECORD</th> </tr> <tr> <th>Date</th> <th>No</th> </tr> </thead> <tbody> <tr><td>-</td><td>01</td></tr> <tr><td>-</td><td>02</td></tr> <tr><td>-</td><td>03</td></tr> <tr><td>-</td><td>04</td></tr> <tr><td>-</td><td>05</td></tr> <tr><td>-</td><td>06</td></tr> <tr><td>-</td><td>07</td></tr> <tr><td>-</td><td>08</td></tr> </tbody> </table>	REVISION RECORD		Date	No	-	01	-	02	-	03	-	04	-	05	-	06	-	07	-	08	<div style="text-align: center;"> <p>GATEWAY®</p> <p>The Gateway Engineers, Inc. Full-Service Civil Engineering & Surveying Pittsburgh, PA</p> <p>gatewayengineers.com 855-634-9284</p> </div>
REVISION RECORD																							
Date	No																						
-	01																						
-	02																						
-	03																						
-	04																						
-	05																						
-	06																						
-	07																						
-	08																						








APPENDIX K

© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map Impact 9



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

	Cross Section (XS) Lines		Location of flood information
	Base Flood Elevation (BFE) Lines	User Notes:	
	Floodway		Impact 9
Flood Hazard Zone			
	Approximate Study (Zone A)		
	Detailed Study (AE, AH, AO)		
	Community Rating System Areas		
Disclaimer:			
<p>The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool</i> (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>			

Map created on January 8, 2016

Flood Hazard Area:	
Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.	
Flood Hazard Zone:	A (Advisory A)
Stream:	South Fork Hughes River
FEMA Issued Flood Map:	54017C0225C
Watershed (HUC8):	Little Kanawha (5030203)
Advisory Flood Height:	About 864 ft
Water Depth:	About 6.4 ft (Source: HEC_RA)
Elevation:	About 857 ft
Location (long, lat):	(80.804618 W, 39.194741 N)
Location (UTM 17N):	(516872, 4338405)
Contacts:	Doddridge
CRS Information:	N/A
Flood Profile:	
HEC-RAS Model:	South Fork Hughes River
Parcel Number:	

APPENDIX L

DEVELOPMENT SITE/PROPERTY INFORMATION – IMPACT 10

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Development Site/Property Information:

Please provide physical description of the site/property, along with pertinent ownership (surface and mineral rights) data as applicable. Attach appropriate maps from the WV Flood Tool showing location of proposed development. Use additional copies of this page if development spans multiple property boundaries. Designate each property by number (i.e. Property 1 of 1, Property 2 of 7, etc.)

Property Designation: 10 of 10

Site/Property Information:		
Legal Description: Large Forested Commercial Lot (Stream Crossing #10)		
Physical Address/911 Address: Parcel Tax ID: 7-10-2		
Decimal Latitude/Longitude: 39.195213 N / 80.805695 W		
DMS Latitude/Longitude: 39° 11' 42.76" N / 80° 48' 20.50" W		
District: N/A	Map: N/A	Parcel: N/A
Land Book Description: N/A		
Deed Book Reference: N/A		
Tax Map Reference: N/A		
Existing Buildings/Use of Property: Commercial Lot		

Floodplain Location Data: (to be completed by Floodplain Manager or designee)			
Community:	Number:	Panel:	Suffix:
Location (Lat/Long):		Approximate Elevation:	
		Estimated BFE:	
Is the development in the floodway? <input type="checkbox"/> Yes <input type="checkbox"/> No		Is the development in the floodplain? <input type="checkbox"/> Yes <input type="checkbox"/> No Zone: _____	
Notes:			

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Property Owner Data:

Please provide data on current site/property landowner(s), both surface and mineral rights (as applicable). Use additional copies of this page as needed. Designate each page in relation to each property listed above.

Property Designation: 10 of 10

Property Owner Data:

Name of Primary Owner (PO): Ike Morris

PO Address: PO Box 397

City: Glenville

State: WV

Zip: 26351

PO Primary Phone: 304-347-1132

PO Secondary Phone:

PO Primary Email:

Surface Rights Owner Data:

Name of Primary Owner (PO): N/A

PO Address:

City:

State:

Zip:

PO Primary Phone:

PO Secondary Phone:

PO Primary Email:

Mineral Rights Owner Data: (As Applicable)

Name of Primary Owner (PO): N/A

PO Address:

City:

State:

Zip:

PO Primary Phone:

PO Secondary Phone:

PO Primary Email:

Doddridge County Commercial/Industrial
Floodplain Development Permit Application

Adjacent and/or Affected Landowners Data

Please provide data for all adjacent and/or affected surface owners (both up and down stream) whose property may be impacted by proposed development as demonstrated by a floodplain study or survey. Use additional copies of this page as needed.

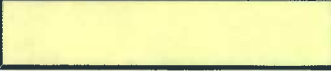








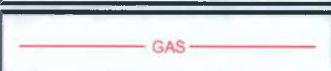






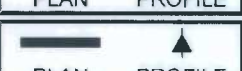
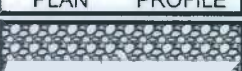




Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): Ike Morris		
Physical Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Upstream		
Name of Primary Owner (PO): May Revocable Trust		
Physical Address: N/A		
City:	State:	Zip:
PO Primary Phone: N/A		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): Ike Morris		
Physical Address: PO Box 397		
City: Glenville	State: WV	Zip: 26351
PO Primary Phone: 304-347-1132		
PO Secondary Phone:		
PO Primary Email:		

Adjacent Property Owner Data: Downstream		
Name of Primary Owner (PO): CNG Transmission		
Physical Address: N/A		
City:	State:	Zip:
PO Primary Phone: N/A		
PO Secondary Phone:		
PO Primary Email:		

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: 18422-0011
 Drawing Scale: 1/4" = 1'-0"
 Date issued: JAN 2016
 Index Number:
 Drawn By: JLB
 Checked By: DMH
 Project Manager: DMH

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

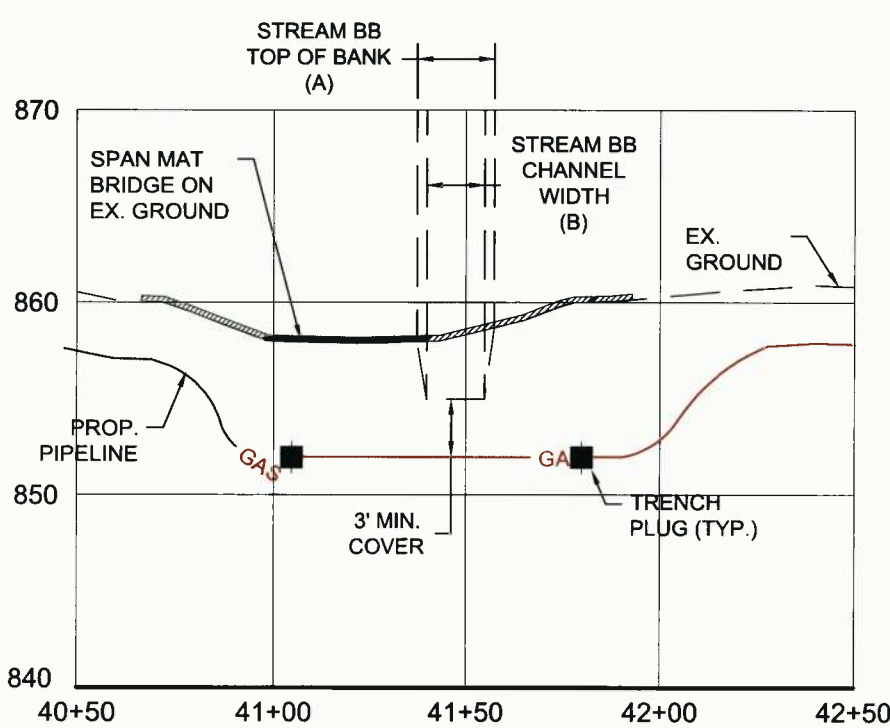
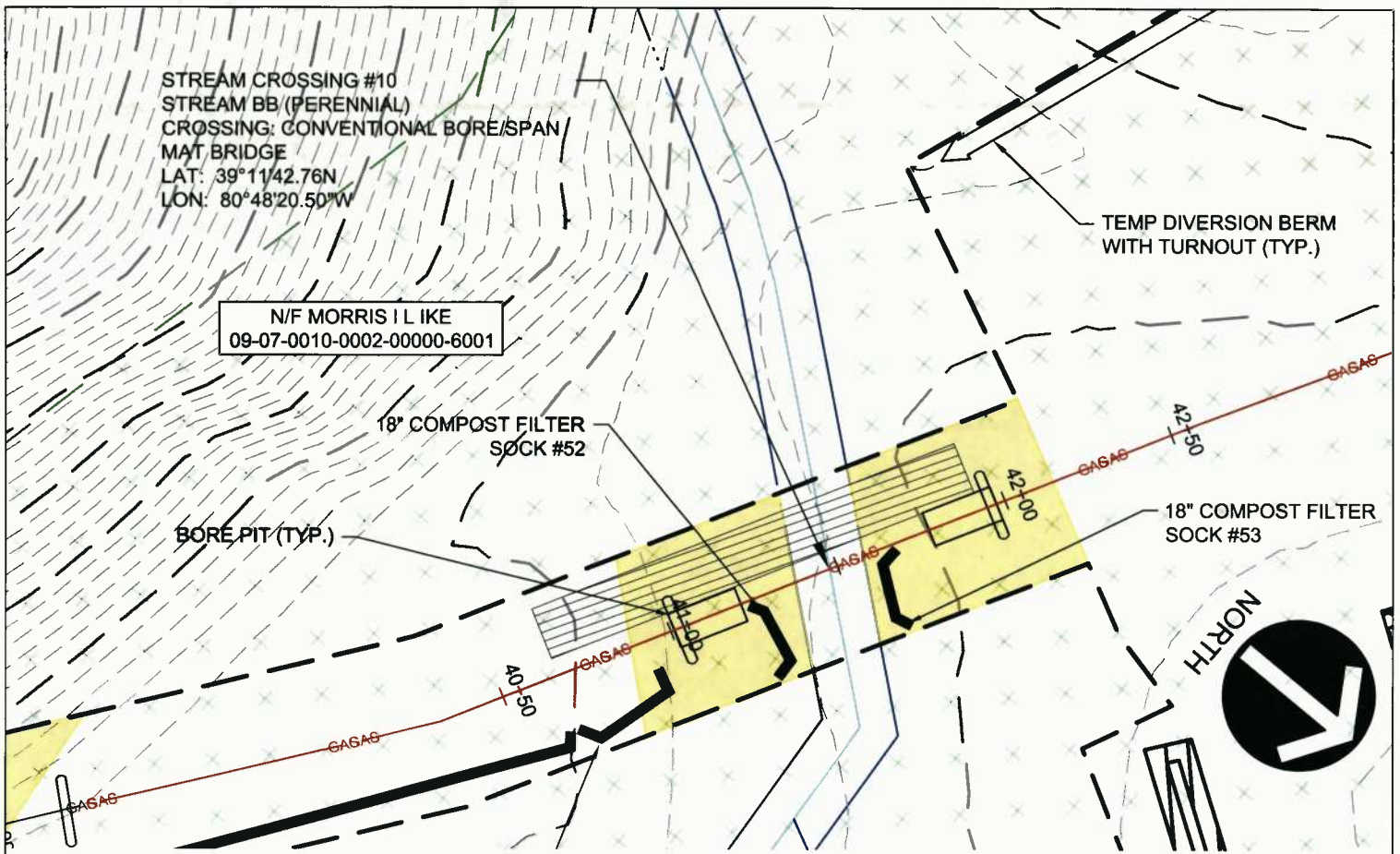
PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

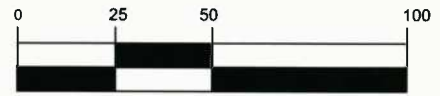


GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

LEGEND



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #10
 PLAN AND PROFILE
 Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN 2016
 Index Number:
 Drawn By: TJS
 Checked By: DMZ
 Project Manager: DMZ

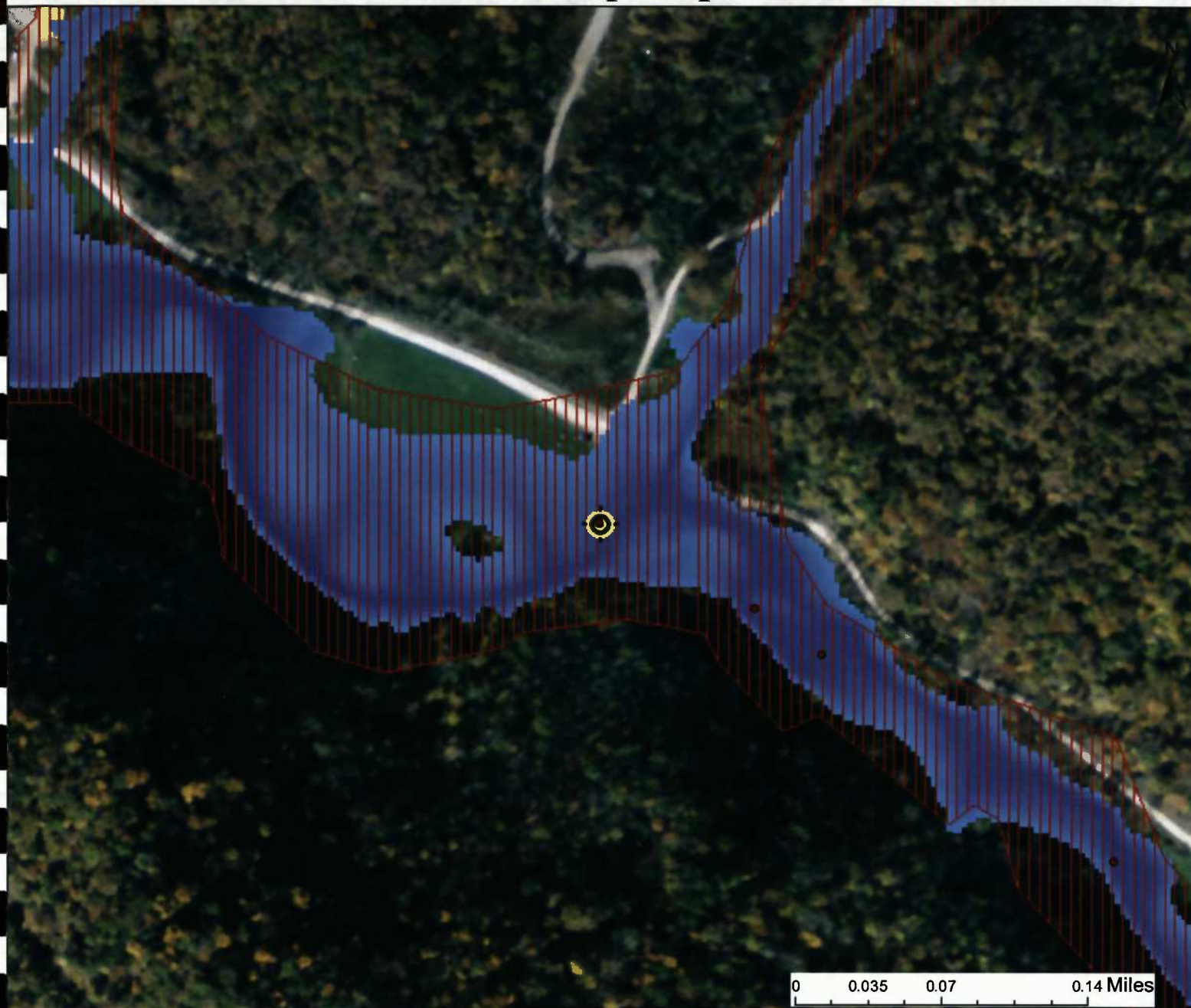
MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA
 PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-8284

© Gateway Engineers Inc. All Rights Reserved

WV Flood Map Impact 10

























This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool</i> (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>		<p> Location of flood information</p> <p>User Notes: Impact 10</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is WITHIN the FEMA 100-year floodplain.</p> <p>Flood Hazard Zone: A (Advisory A)</p> <p>Stream: South Fork Hughes River</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Kanawha (5030203)</p> <p>Advisory Flood Height: About 863 ft</p> <p>Water Depth: About 5.0 ft (Source: HEC_RA)</p> <p>Elevation: About 858 ft</p> <p>Location (long, lat): (80.805695 W, 39.195213 N)</p> <p>Location (UTM 17N): (516779, 4338457)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile:</p> <p>HEC-RAS Model: South Fork Hughes River</p> <p>Parcel Number:</p>
--	--	---	--

APPENDIX M
UNREGULATED FLOODPLAIN IMPACT SITE MAPS

LEGEND

	EROSION CONTROL BLANKET
	EXISTING PEM WETLANDS
	EXISTING PSS OR PFO WETLANDS
	PROPERTY LINE
	EXISTING STREAM
MAJOR  908 MINOR 	EXISTING CONTOURS
	FEMA FLOODPLAIN
	LIMITS OF DISTURBANCE/ PERMIT BOUNDARY
	PROPOSED PIPELINE
	DIVERSION BERM
	TURNOUT
 PLAN  PROFILE	TRENCH PLUG
 PLAN  PROFILE	WATERBAR
	ROCK CONSTRUCTION ENTRANCE
	ORANGE CONSTRUCTION FENCE
	SPAN MAT BRIDGE
	SILT FENCE
	COMPOST FILTER SOCK
	SUPER SILT FENCE

SITE PLAN LEGEND

Project Number: 18422-0011
 Drawing Scale: 1/1.5"
 Date Issued: JAN 2016
 Index Number:
 Drawn By: JAB
 Checked By: DMH
 Project Manager: DMH

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

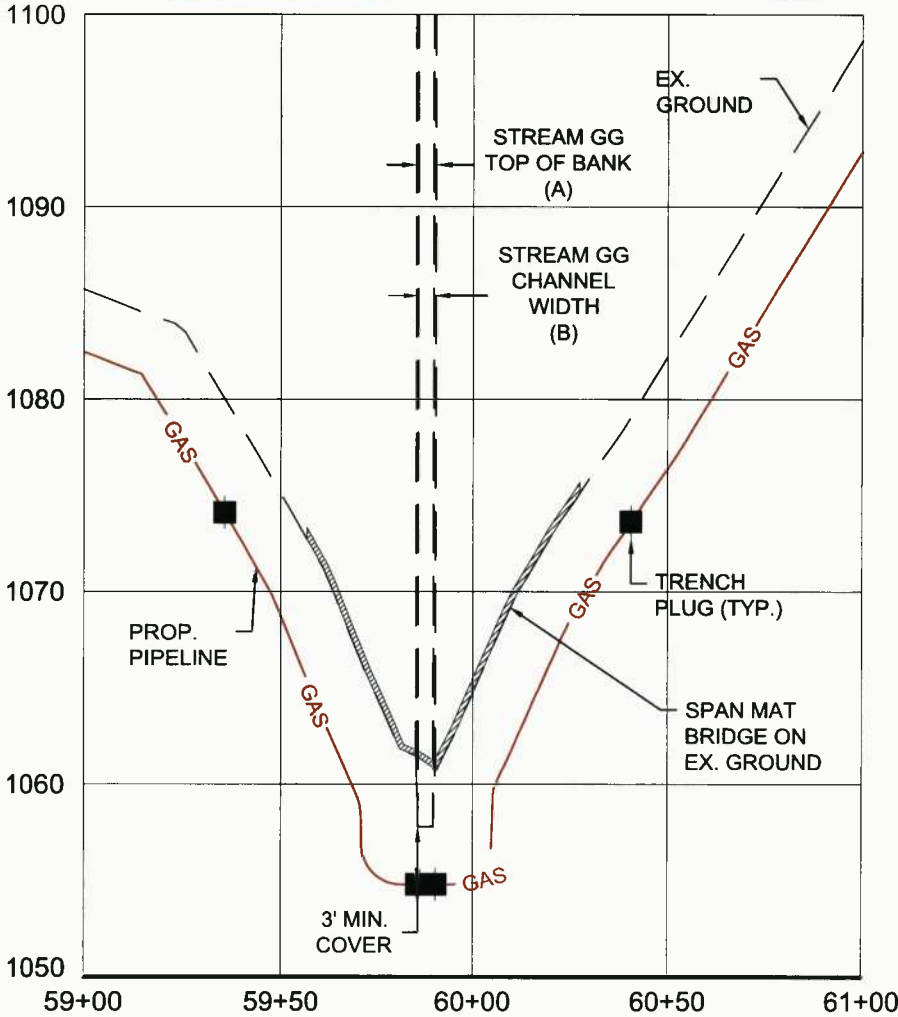
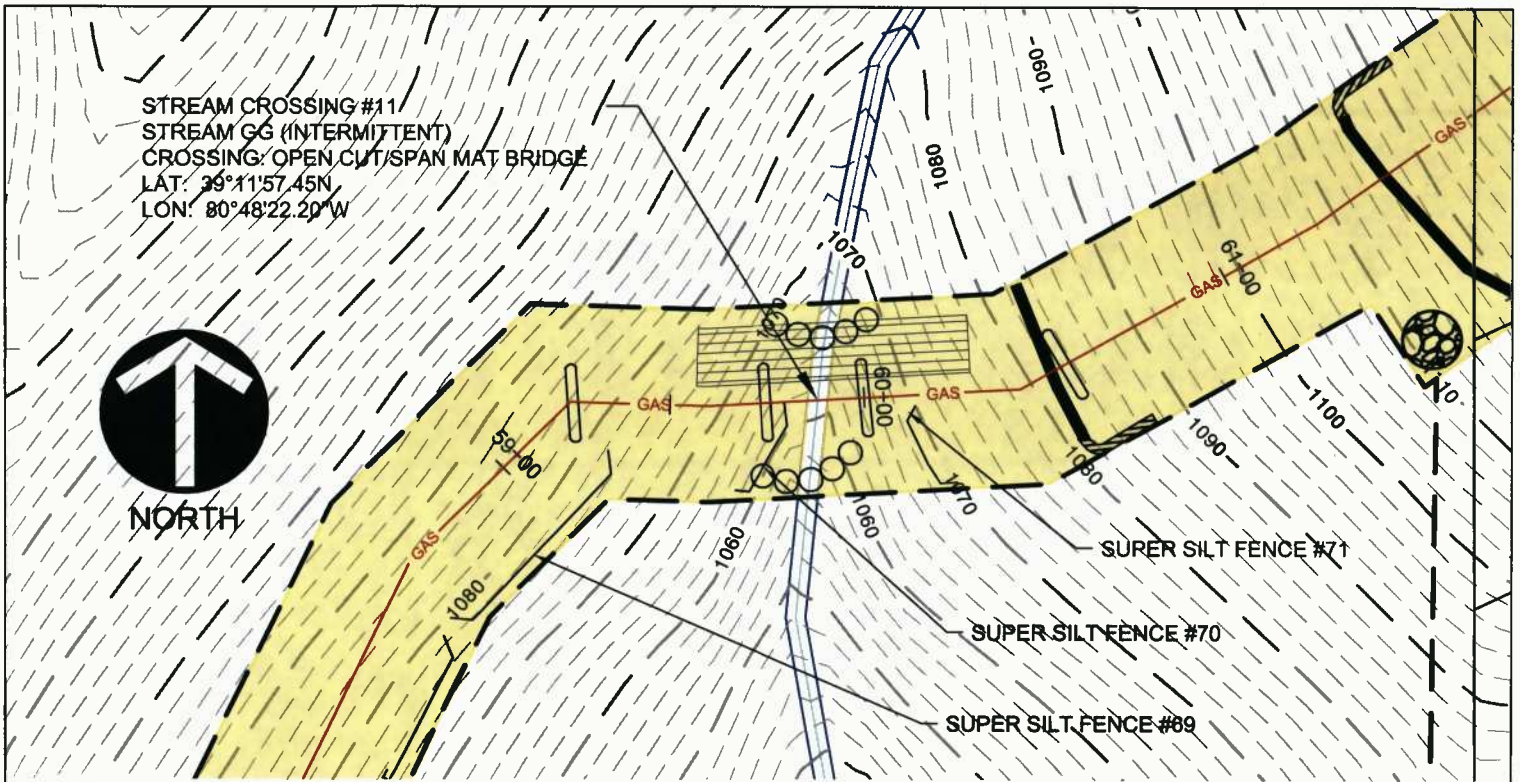
PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

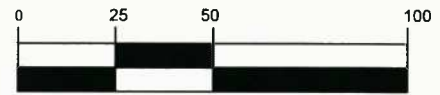


GATEWAY[®]
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

STREAM CROSSING #11
 STREAM GG (INTERMITTENT)
 CROSSING: OPEN CUT/SPAN MAT BRIDGE
 LAT: 39°11'57.45N
 LON: 80°48'22.20W



GRAPHIC SCALE



(IN FEET)
 1 inch = 50 ft.

**STREAM CROSSING #11
 PLAN AND PROFILE**

Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN 2018
 Index Number:
 Drawn By: AAN
 Checked By: DMJ
 Project Manager: DMJ

**MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA**

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	



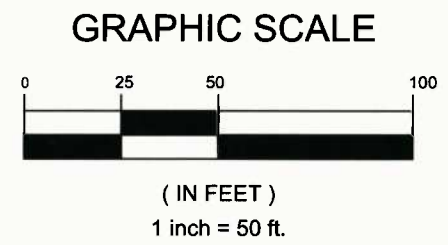
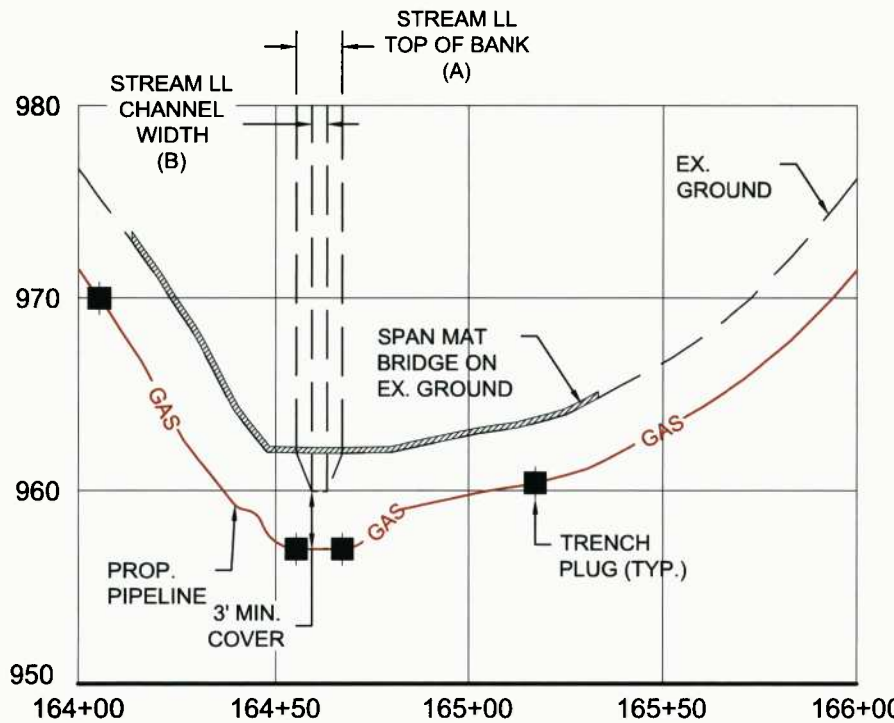
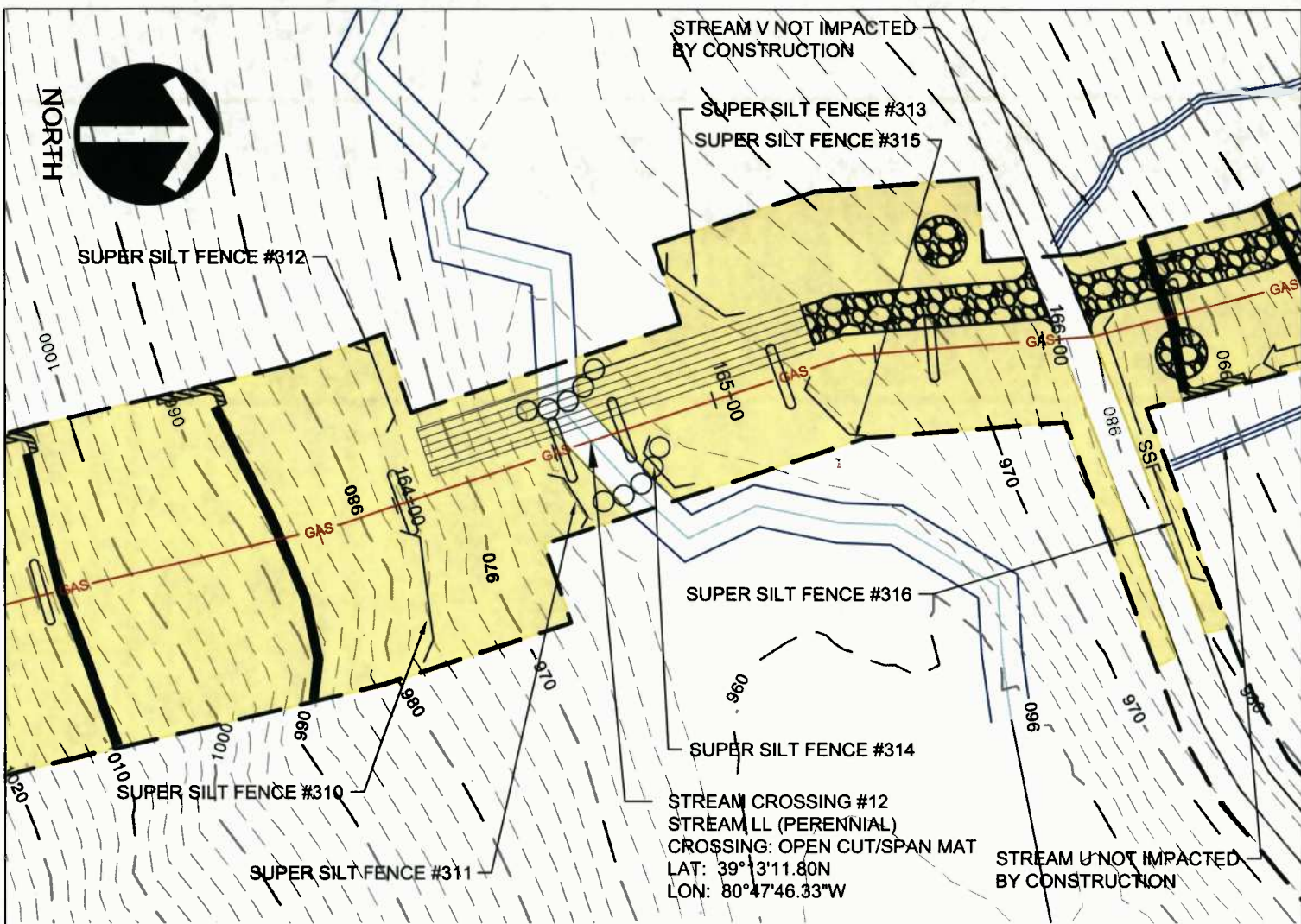
The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

WV Flood Map Impact 11



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool</i> (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</p>		<p> Location of flood information</p> <p>User Notes: Impact 11</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54067C0425C</p> <p>Watershed (HUC8): Gauley (5050005)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1972 ft</p> <p>Location (long, lat): (80.806220 W, 38.199362 N)</p> <p>Location (UTM 17N): (516967, 4227952)</p> <p>Contacts: Nicholas</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	---	--



STREAM CROSSING #12
 PLAN AND PROFILE
 Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN. 2018
 Issue Number:
 Drawn By: JAH
 Checked By: DMH
 Project Manager: DMH

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA
 PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

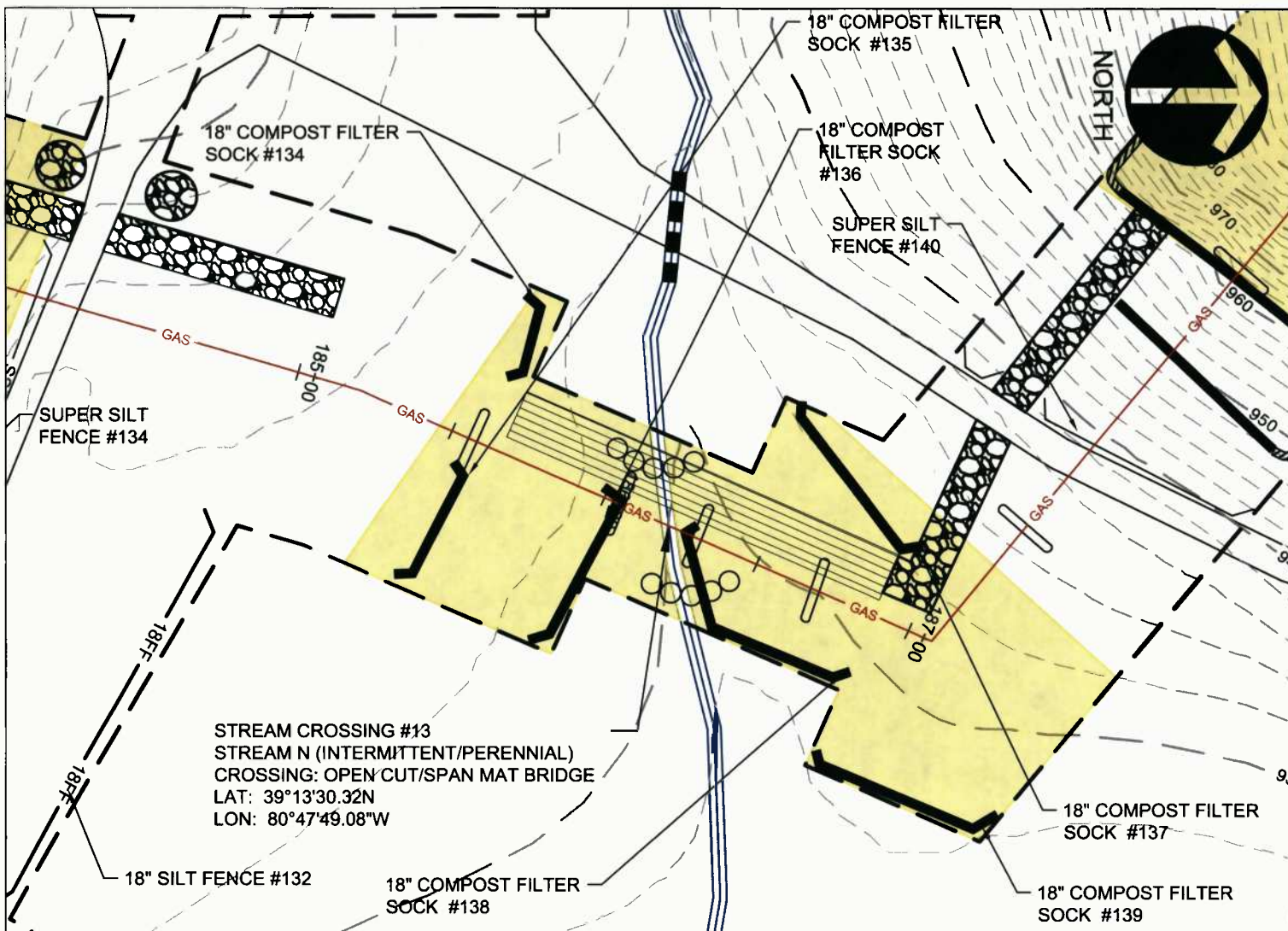
© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map Impact 12

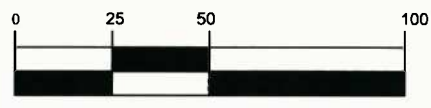


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

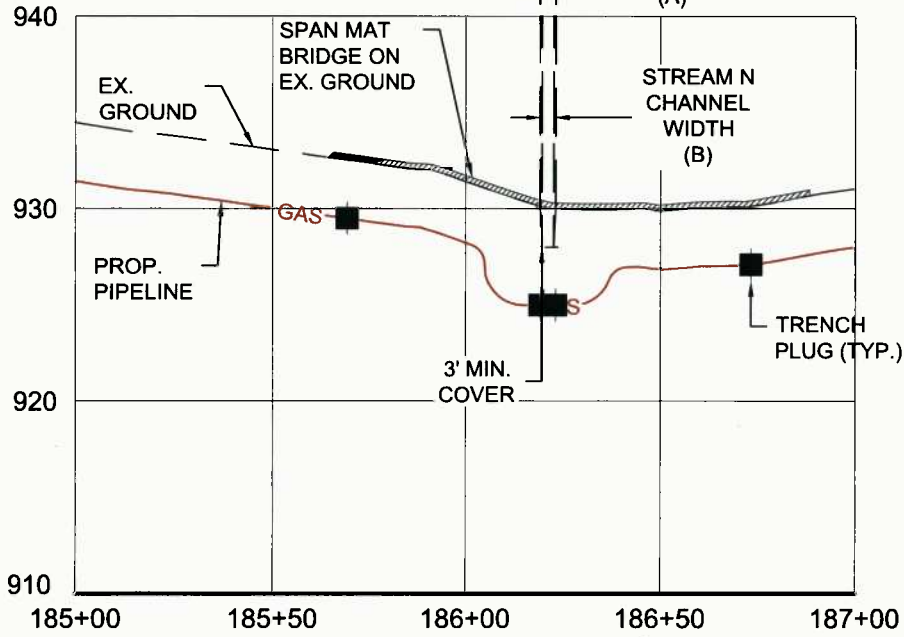
<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 12</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5031)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 961 ft</p> <p>Location (long, lat): (80.796235 W, 39.219944 N)</p> <p>Location (UTM 17N): (517590, 4341203)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



GRAPHIC SCALE



(IN FEET)
 1 inch = 50 ft.



STREAM CROSSING #13
 PLAN AND PROFILE

Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN. 2018
 Index Number:
 Drawn By: AMN
 Checked By: DMH
 Project Manager: DMH

APPENDIX M

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

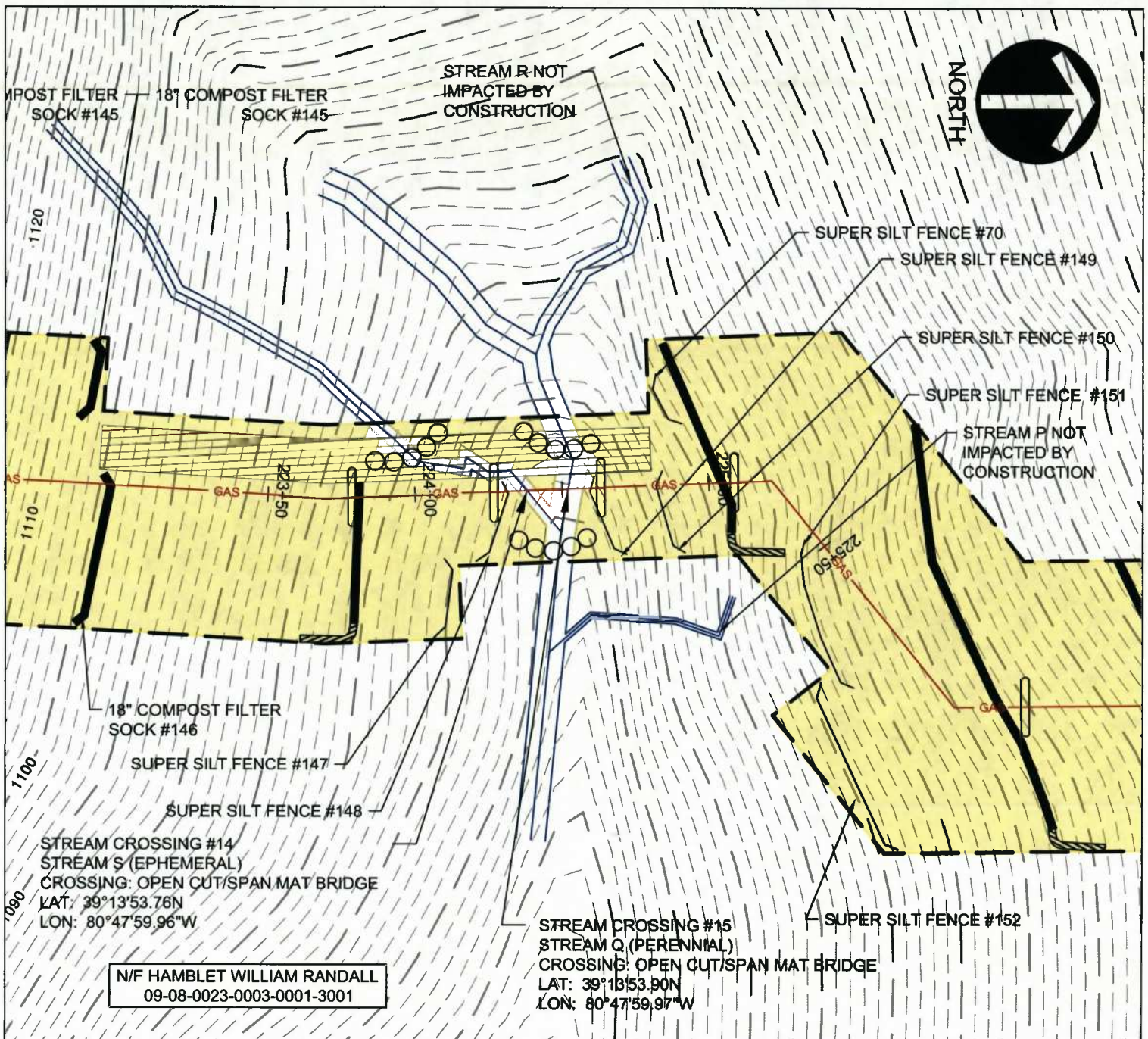
© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map Impact 13

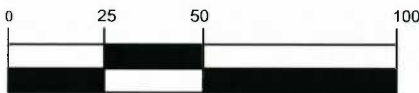


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p> Location of flood information</p> <p>User Notes: Impact 13</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 930 ft</p> <p>Location (long, lat): (80.796969 W, 39.225090 N)</p> <p>Location (UTM 17N): (517525, 4341774)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	---	---



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #14
PLAN

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2018
Issue Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH

APPENDIX M

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

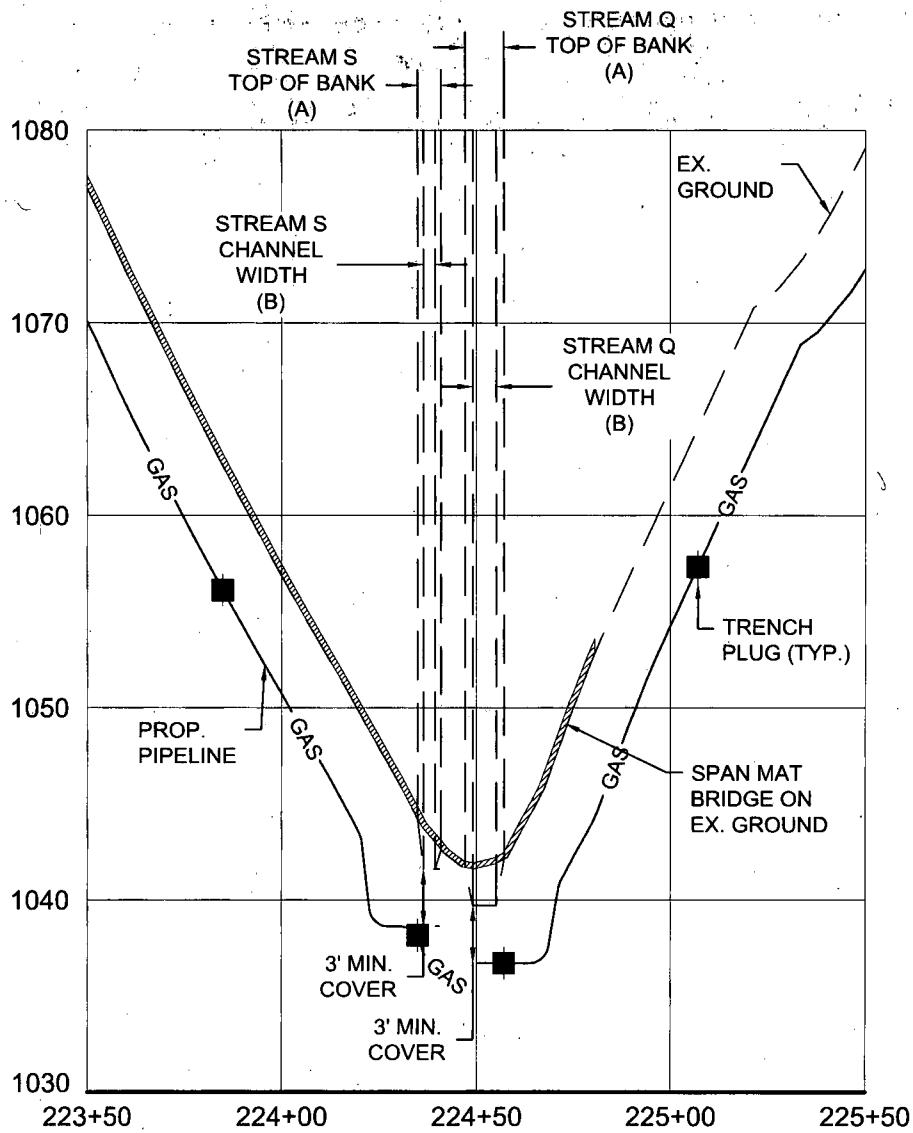
PREPARED FOR:
EQM GATHERING OPCO, LLC
825 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

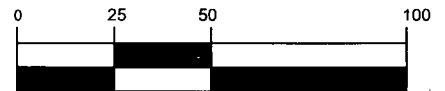
GATEWAY[®]

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA

gatewayengineers.com 855-634-9284



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

**STREAM CROSSING #14
PROFILE**

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN. 2018
Index Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH

APPENDIX M

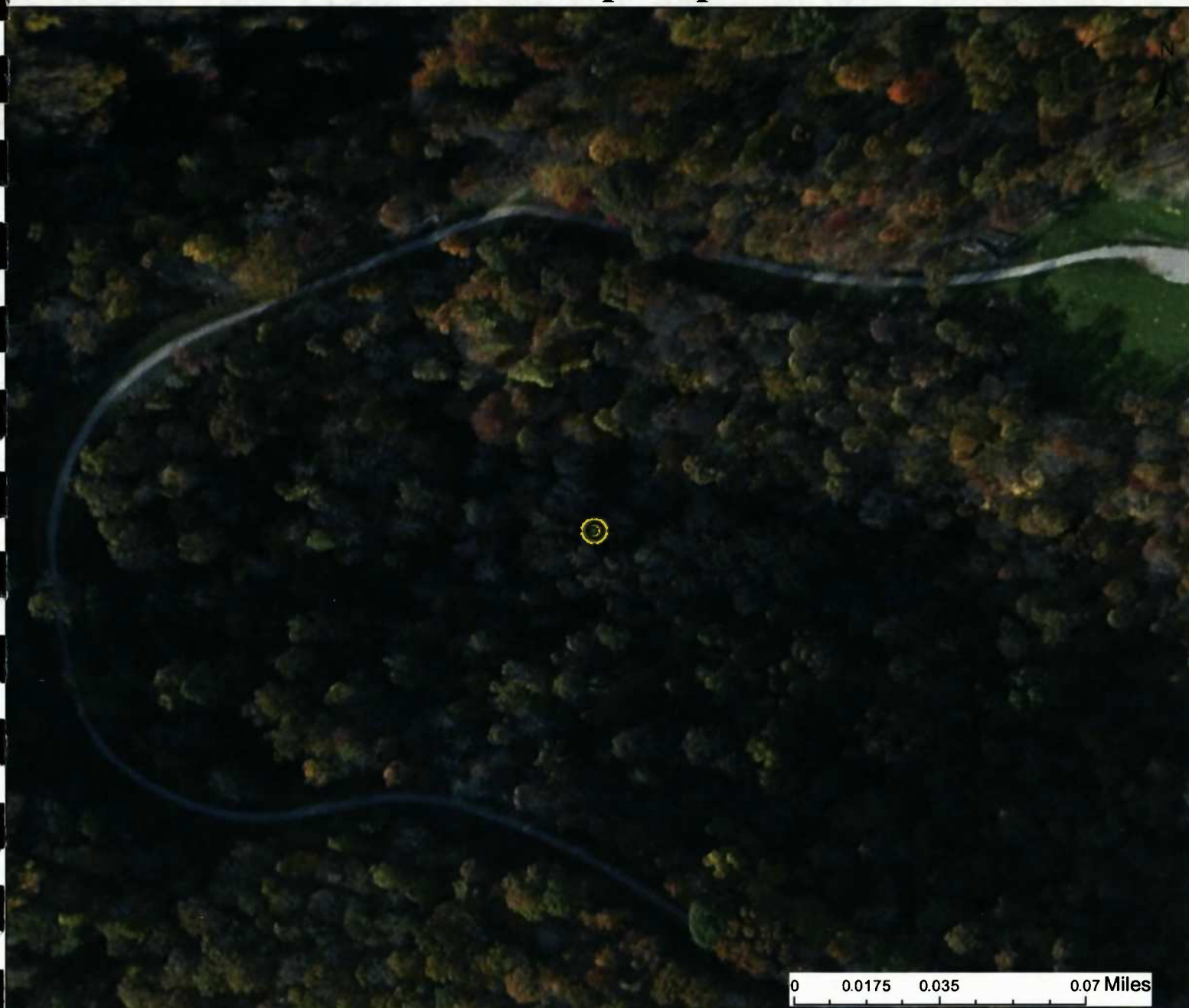
MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

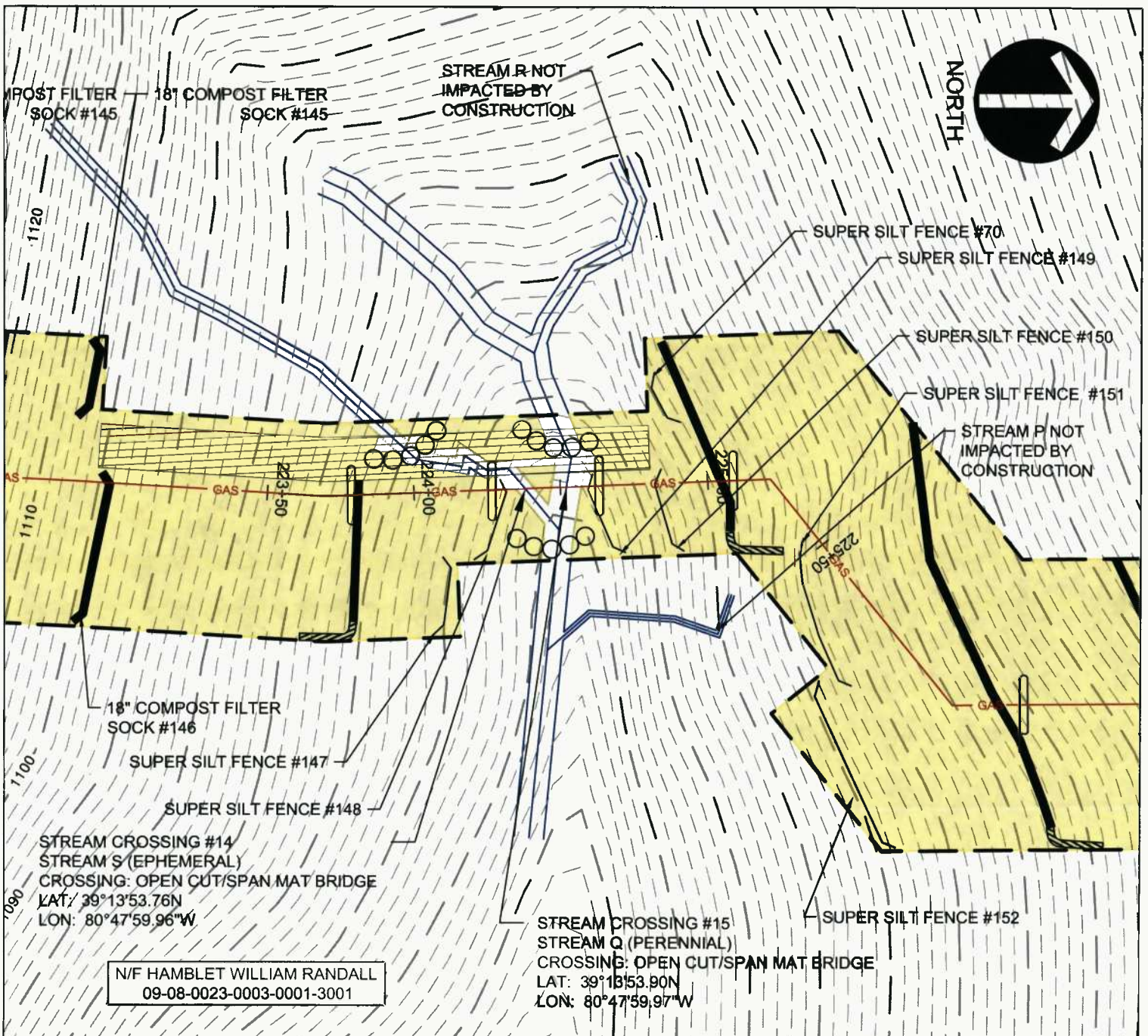
GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

WV Flood Map Impact 14



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

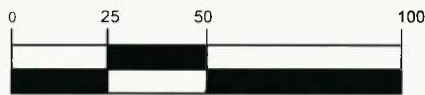
<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 14</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1043 ft</p> <p>Location (long, lat): (80.799990 W, 39.231603 N)</p> <p>Location (UTM 17N): (517263, 4342497)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



N/F HAMBLET WILLIAM RANDALL
09-08-0023-0003-0001-3001

STREAM CROSSING #15
STREAM Q (PERENNIAL)
CROSSING: OPEN CUT/SPAN MAT BRIDGE
LAT: 39°13'53.90N
LON: 80°47'59.97"W

GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #15
PLAN
Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2016
Index Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH
APPENDIX M

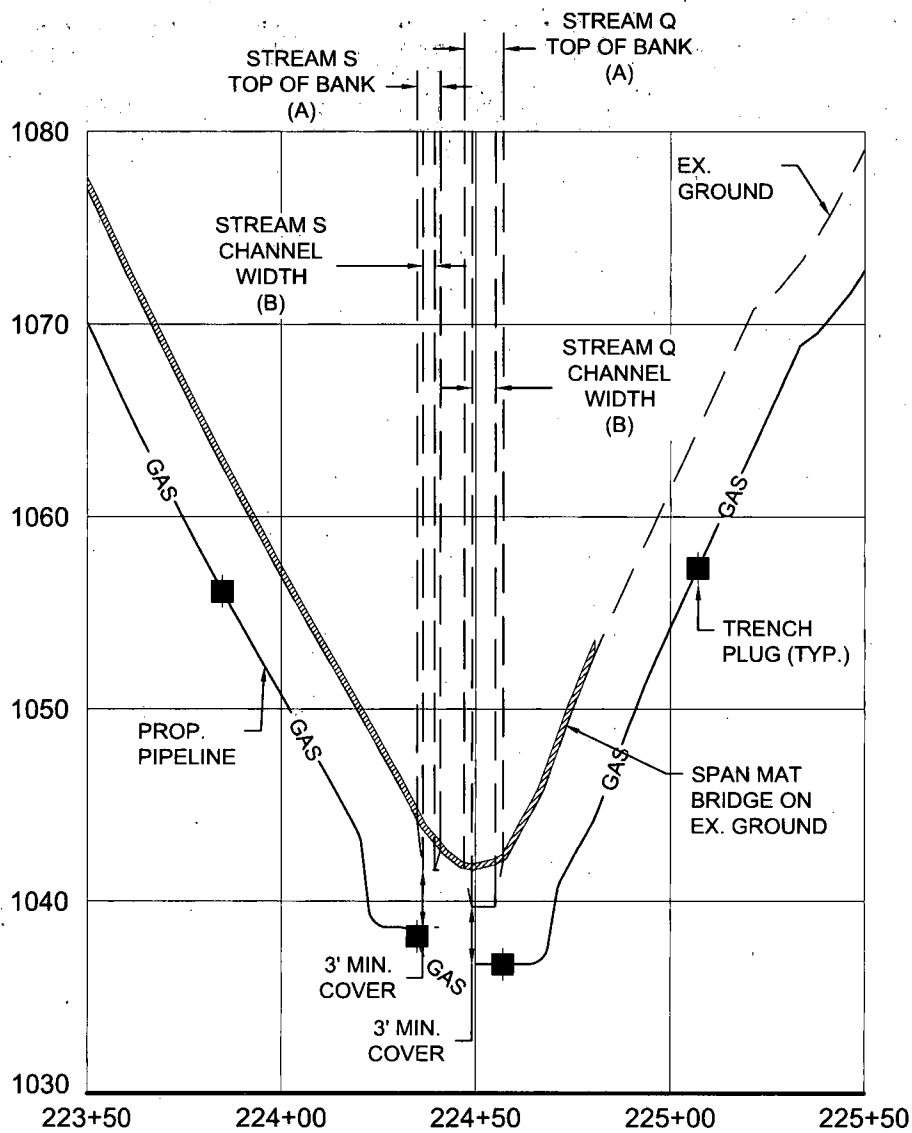
MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

© Gateway Engineers Inc. All Rights Reserved



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #15
PROFILE

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

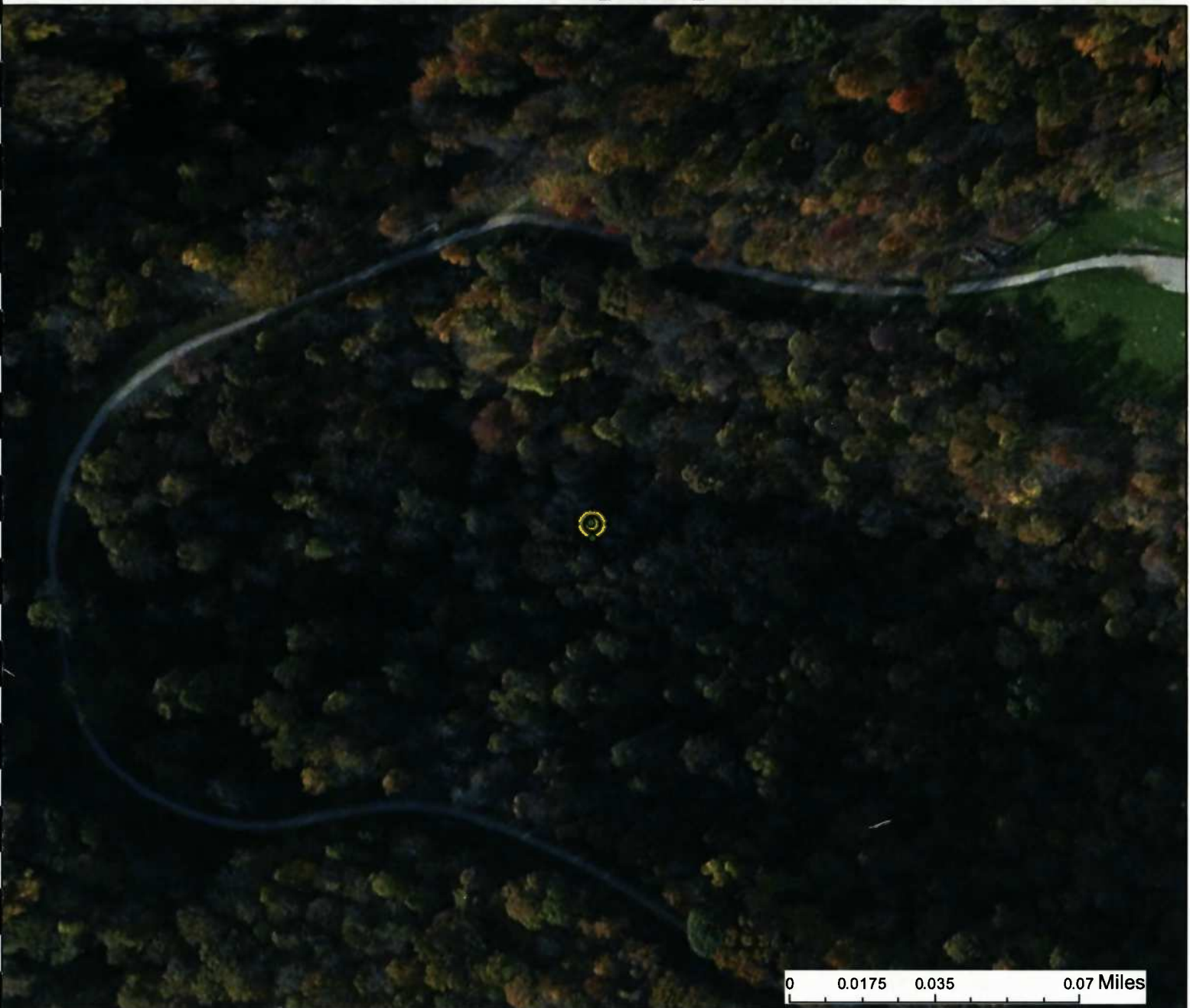
PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222



GATEWAY[®]
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

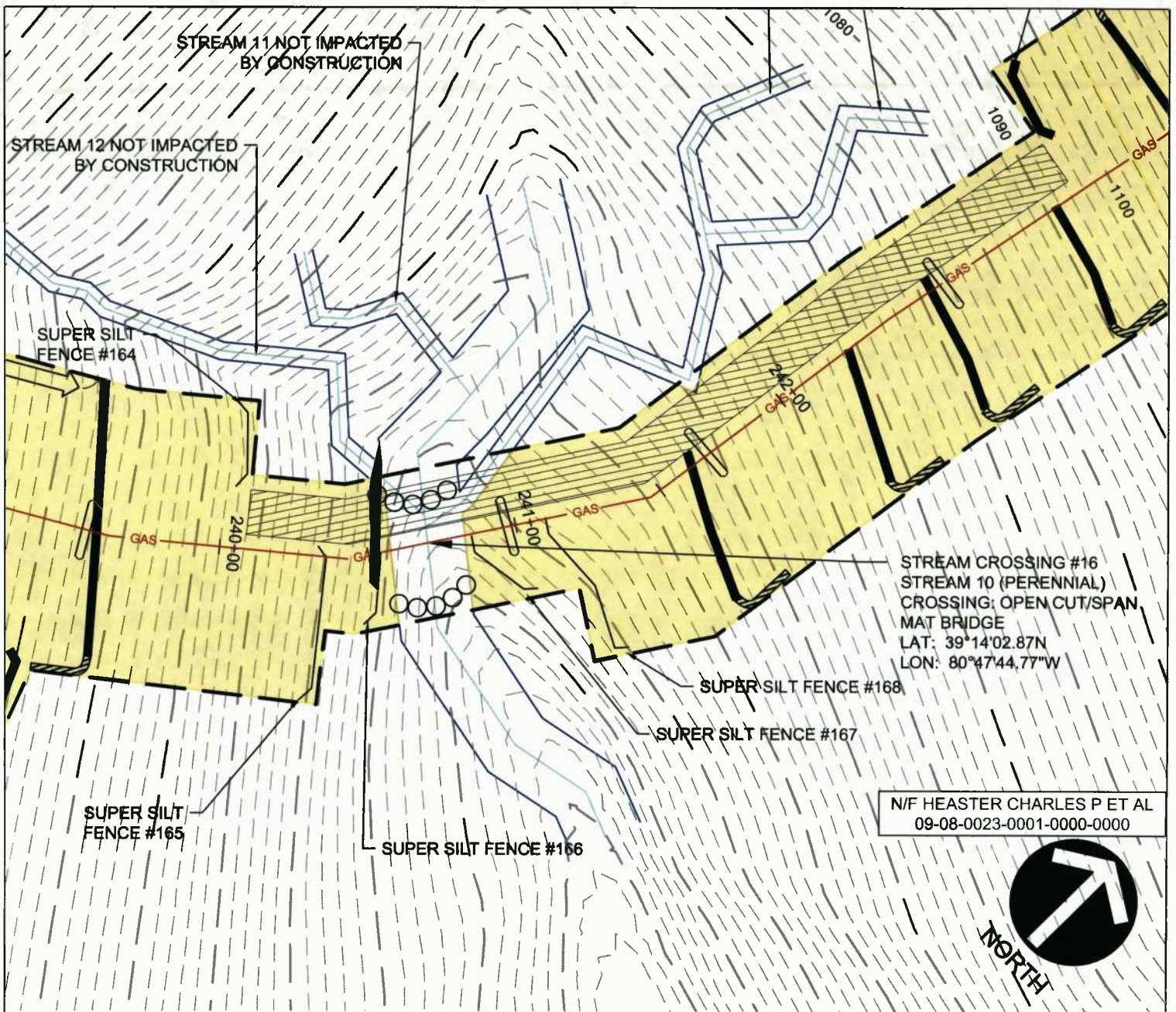
Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN. 2016
Index Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH
APPENDIX M

WV Flood Map Impact 15

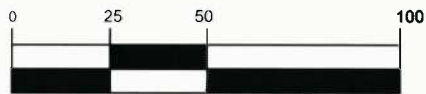


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 15</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1043 ft</p> <p>Location (long, lat): (80.799993 W, 39.231640 N)</p> <p>Location (UTM 17N): (517263, 4342501)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



GRAPHIC SCALE



(IN FEET)
 1 inch = 50 ft.

STREAM CROSSING #16
 PLAN

Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN 2016
 Issue Number:
 Drawn By: AAN
 Checked By: DMT
 Project Manager: DMT

APPENDIX M

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

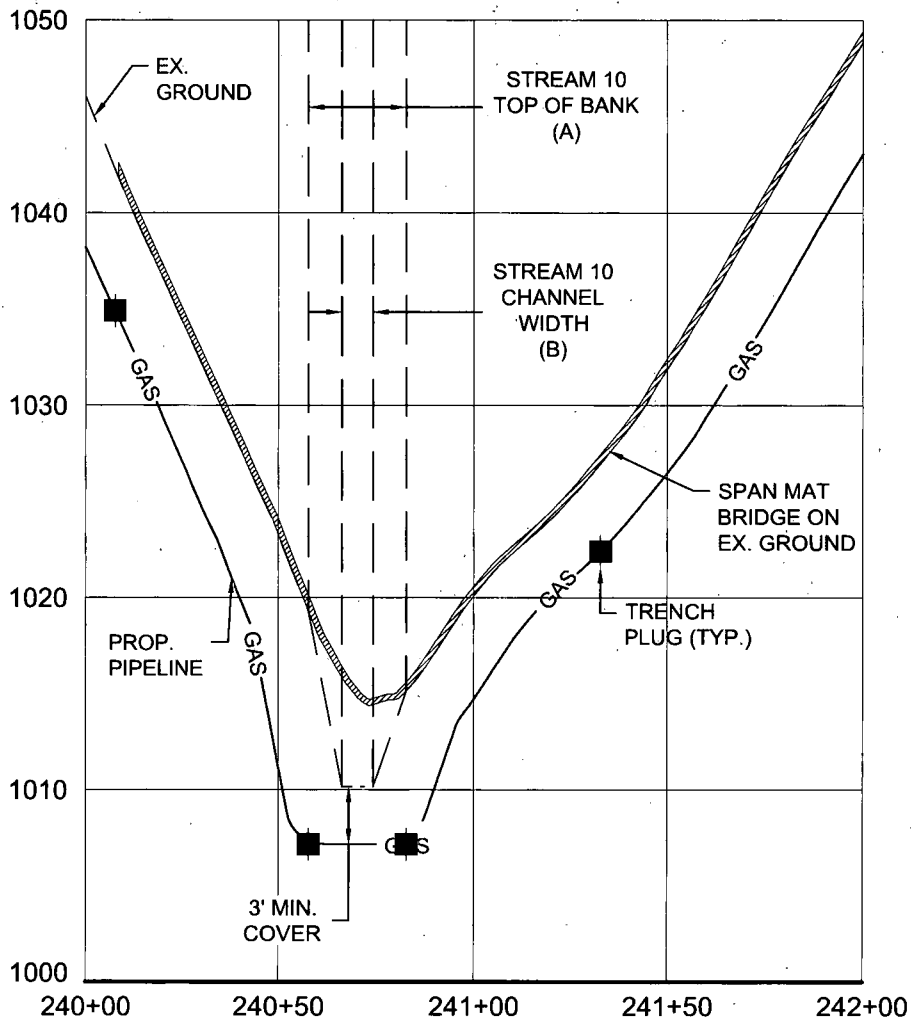
PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

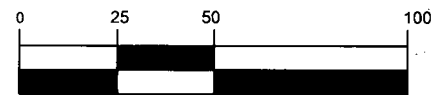
GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA

gatewayengineers.com 655-634-9284



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #16
PROFILE

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2018
Index Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

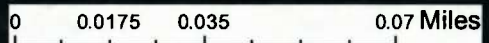
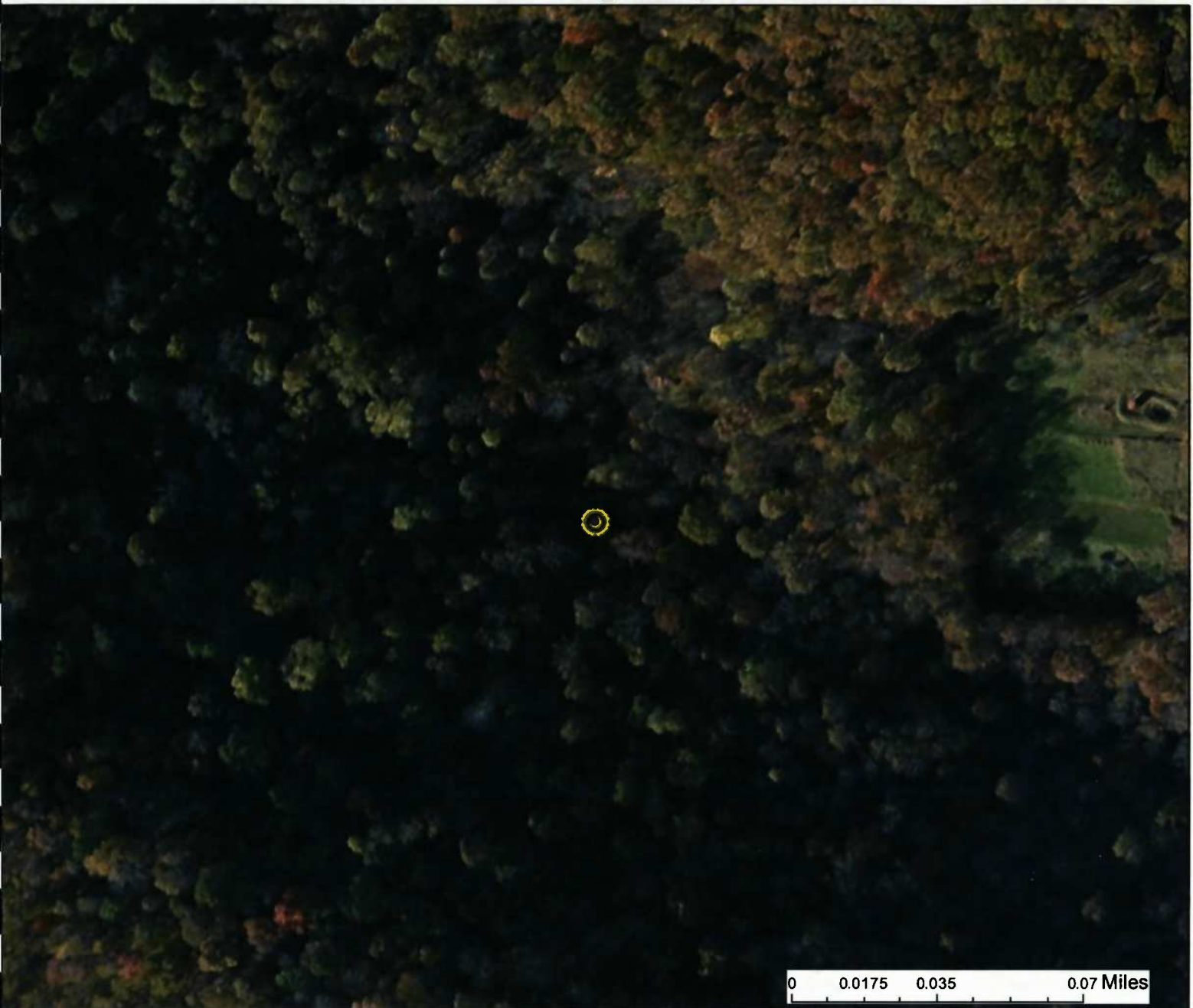


GATEWAY[®]

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

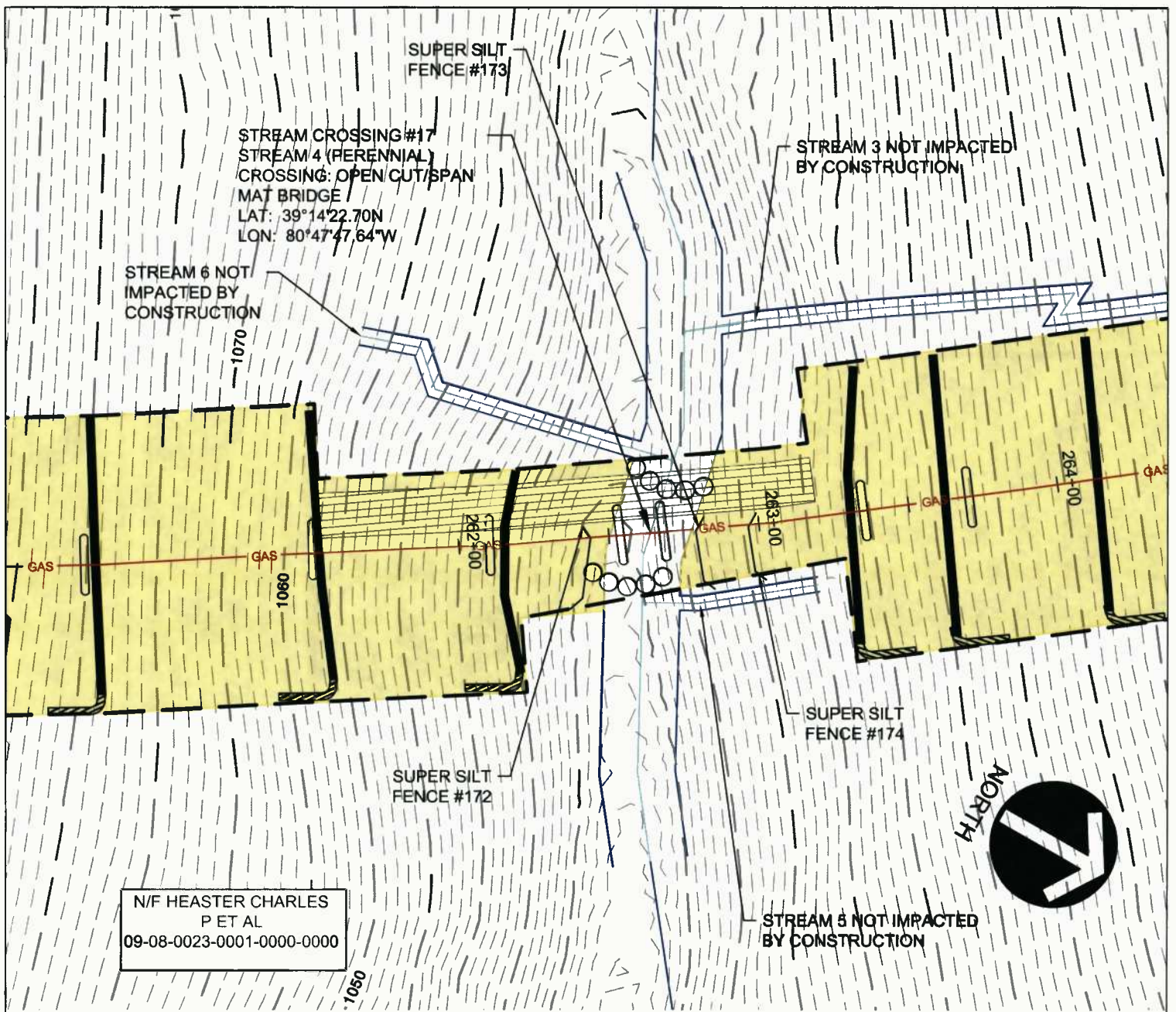
APPENDIX M

WV Flood Map Impact 16



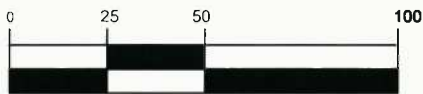
This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 16</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1016 ft</p> <p>Location (long, lat): (80.795772 W, 39.234131 N)</p> <p>Location (UTM 17N): (517626, 4342778)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



N/F HEASTER CHARLES
P ET AL
09-08-0023-0001-0000-0000

GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #17
PLAN
Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2016
Index Number:
Drawn By: AAN
Checked By: DMZ
Project Manager: DMZ
APPENDIX M

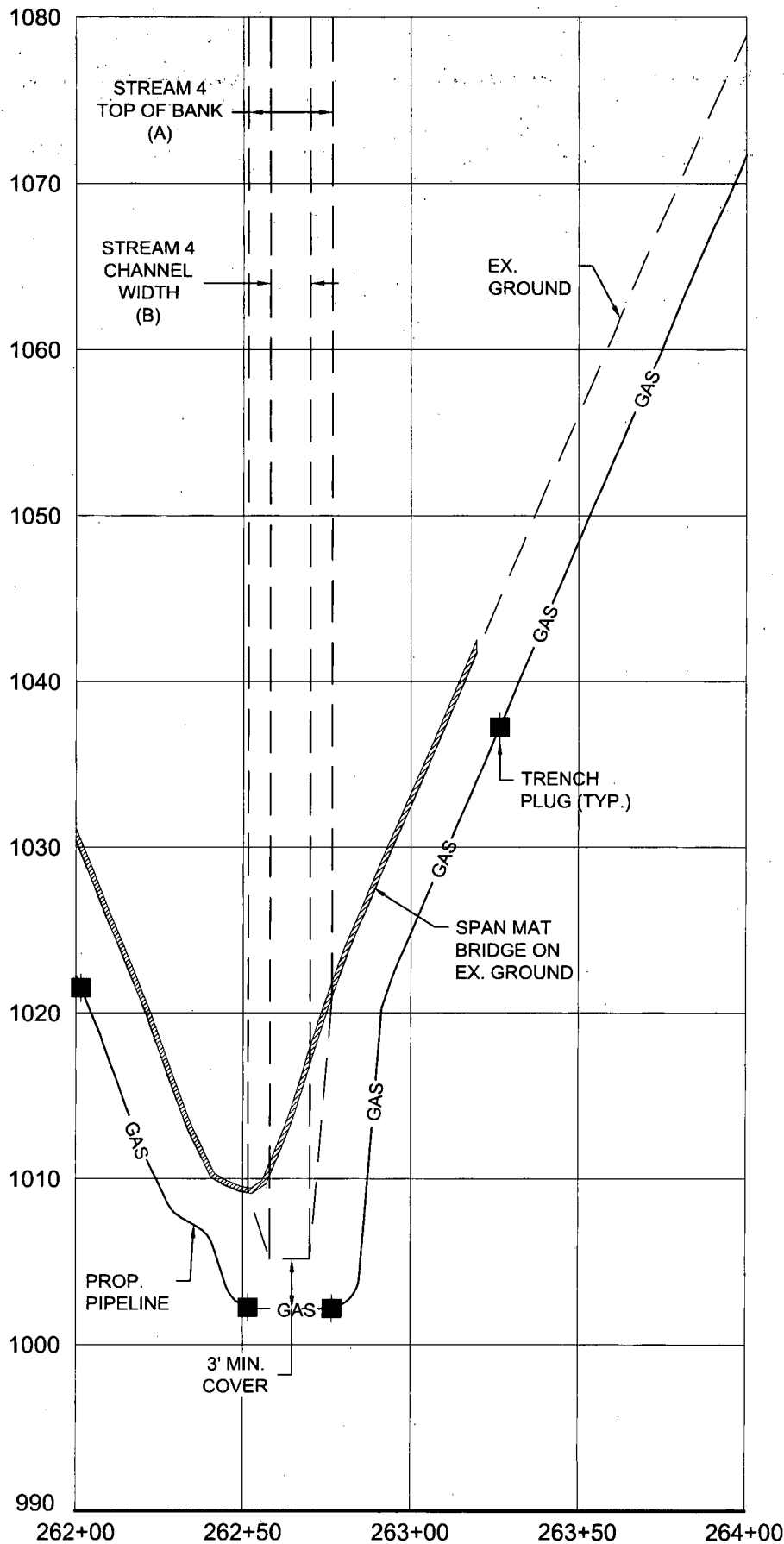
MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	



GATEWAY[®]
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #17
PROFILE
Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN, 2016
Index Number:
Drawn By: JAH
Checked By: DMH
Project Manager: DMH

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map Impact 17

54017C0225C Effective 10/4/2011



0 0.0175 0.035 0.07 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

Map created on January 8, 2016

 Cross Section (XS) Lines

 Base Flood Elevation (BFE) Lines

 Floodway

Flood Hazard Zone

 Approximate Study (Zone A)

 Detailed Study (AE, AH, AO)

 Community Rating System Areas

 Location of flood information

User Notes:
Impact 17

Disclaimer:

The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov.
WV Flood Tool (<http://www.MapWV.gov/flood>) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.

Flood Hazard Area:

Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard

Flood Hazard Zone: N/A

Stream: N/A

FEMA Issued Flood Map: 54017C0225C

Watershed (HUC8): Little Musringum-Middle Island (5031)

Advisory Flood Height: N/A

Water Depth: N/A

Elevation: About 1012 ft

Location (long, lat): (80.796570 W, 39.239640 N)

Location (UTM 17N): (517556, 4343389)

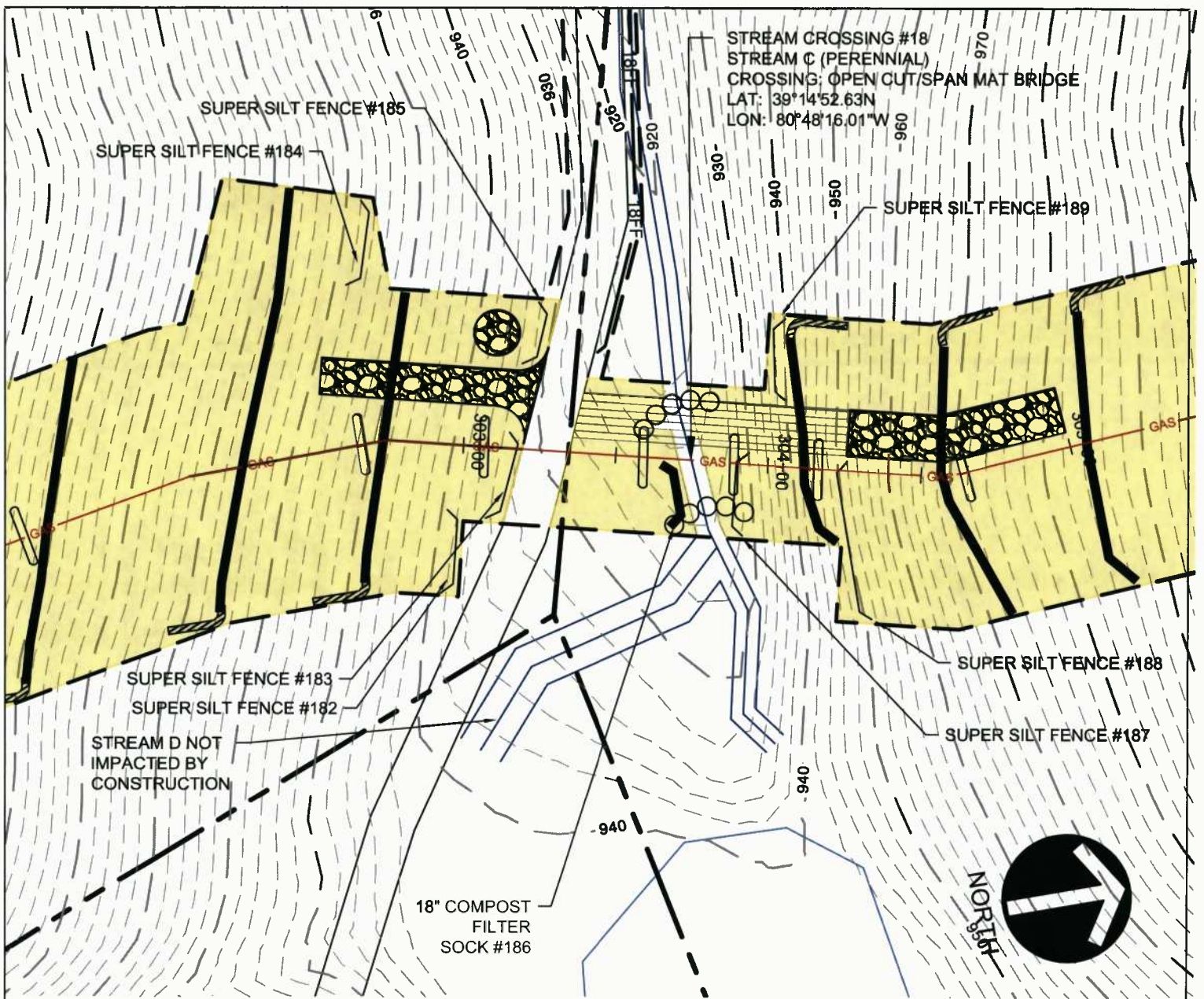
Contacts: Doddridge

CRS Information: N/A

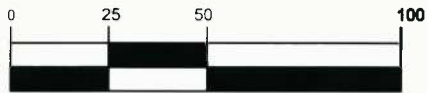
Flood Profile: N/A

HEC-RAS Model: N/A

Parcel Number:

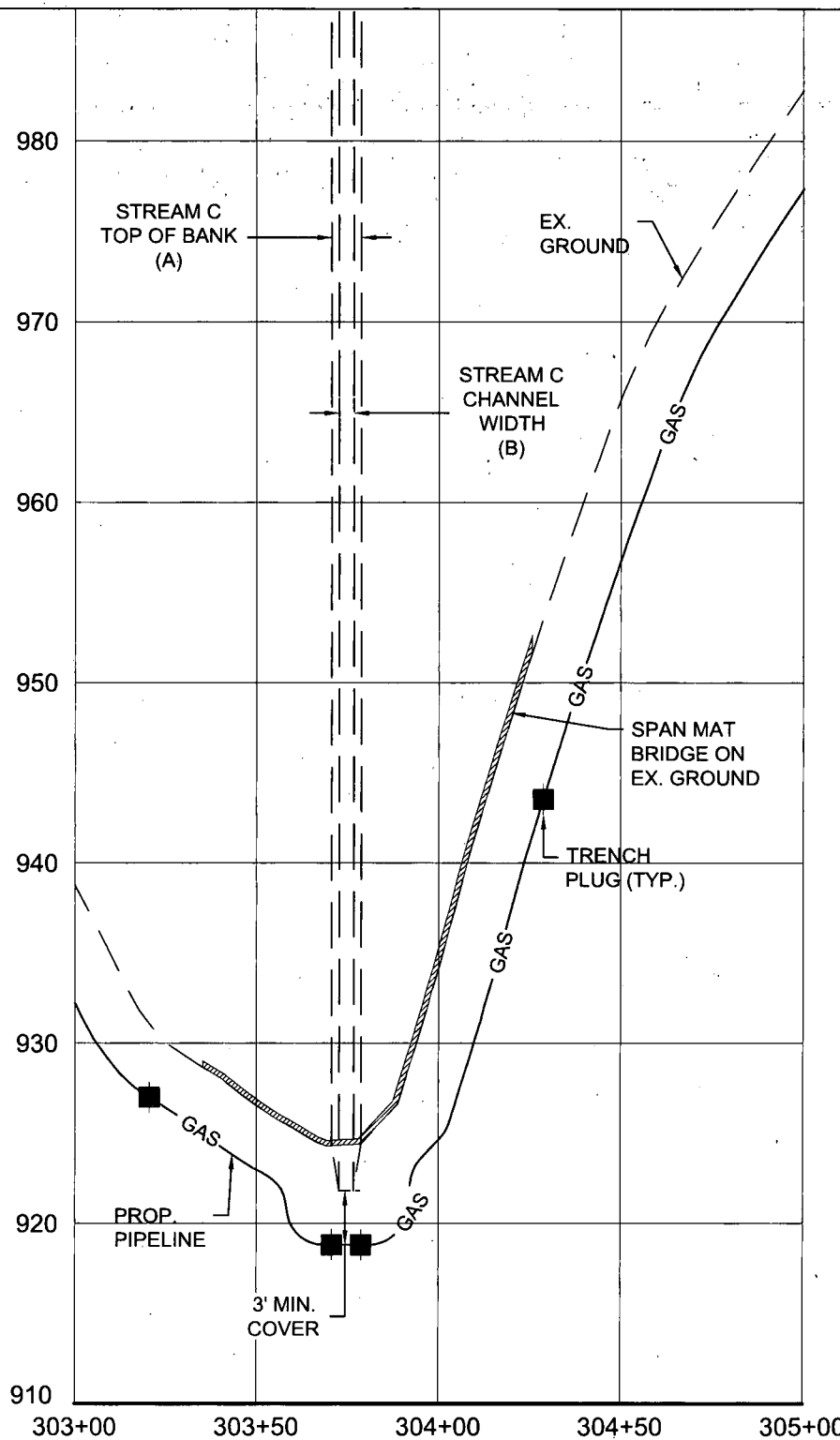


GRAPHIC SCALE

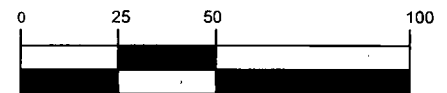


(IN FEET)
1 inch = 50 ft.

<p>STREAM CROSSING #18 PLAN</p> <p>Project Number: 18422-0011 Drawing Scale: 1"=50' Date Issued: JAN 2016 Index Number: Drawn By: AAN Checked By: DMH Project Manager: DMH</p> <p>APPENDIX M</p>	<p>MOSA S033 PIPELINE DODDRIDGE COUNTY, WEST VIRGINIA</p> <p>PREPARED FOR: EQM GATHERING OPCO, LLC 625 LIBERTY AVENUE PITTSBURGH, PENNSYLVANIA, 15222</p>	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th>Date</th> <th>No</th> <th>REVISION RECORD</th> </tr> </thead> <tbody> <tr><td>-</td><td>01</td><td>-</td></tr> <tr><td>-</td><td>02</td><td>-</td></tr> <tr><td>-</td><td>03</td><td>-</td></tr> <tr><td>-</td><td>04</td><td>-</td></tr> <tr><td>-</td><td>05</td><td>-</td></tr> <tr><td>-</td><td>06</td><td>-</td></tr> <tr><td>-</td><td>07</td><td>-</td></tr> <tr><td>-</td><td>08</td><td>-</td></tr> </tbody> </table>	Date	No	REVISION RECORD	-	01	-	-	02	-	-	03	-	-	04	-	-	05	-	-	06	-	-	07	-	-	08	-	<p>GATEWAY®</p> <p>The Gateway Engineers, Inc. Full-Service Civil Engineering & Surveying Pittsburgh, PA gatewayengineers.com 855-634-9284</p>
Date	No	REVISION RECORD																												
-	01	-																												
-	02	-																												
-	03	-																												
-	04	-																												
-	05	-																												
-	06	-																												
-	07	-																												
-	08	-																												



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #18
PROFILE

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222



GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

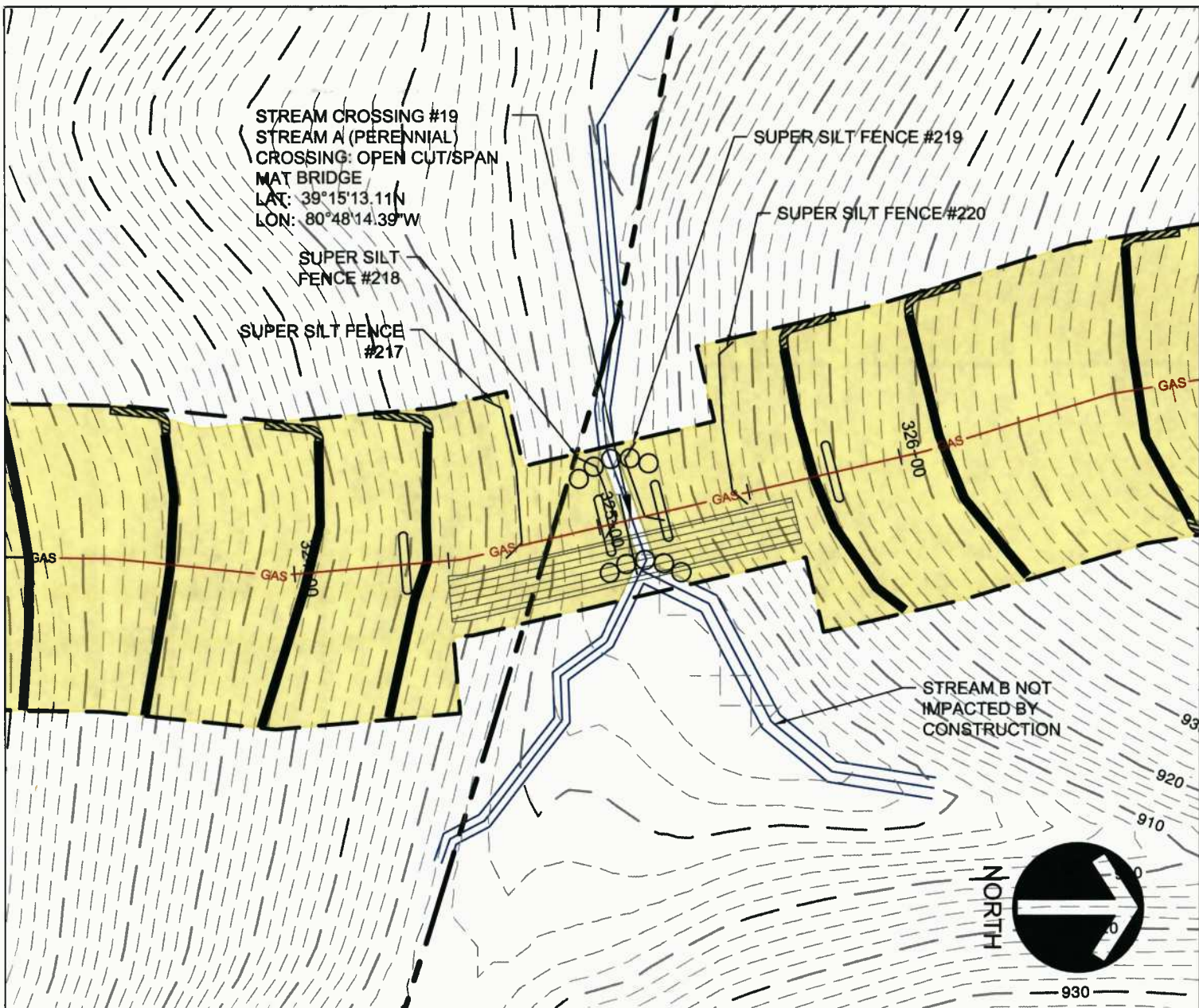
Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2016
Index Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH
APPENDIX M

WV Flood Map Impact 18

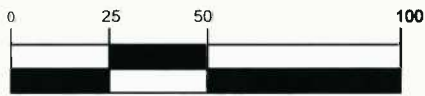


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 18</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 924 ft</p> <p>Location (long, lat): (80.804449 W, 39.247953 N)</p> <p>Location (UTM 17N): (516874, 4344310)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



GRAPHIC SCALE



(IN FEET)
 1 inch = 50 ft.

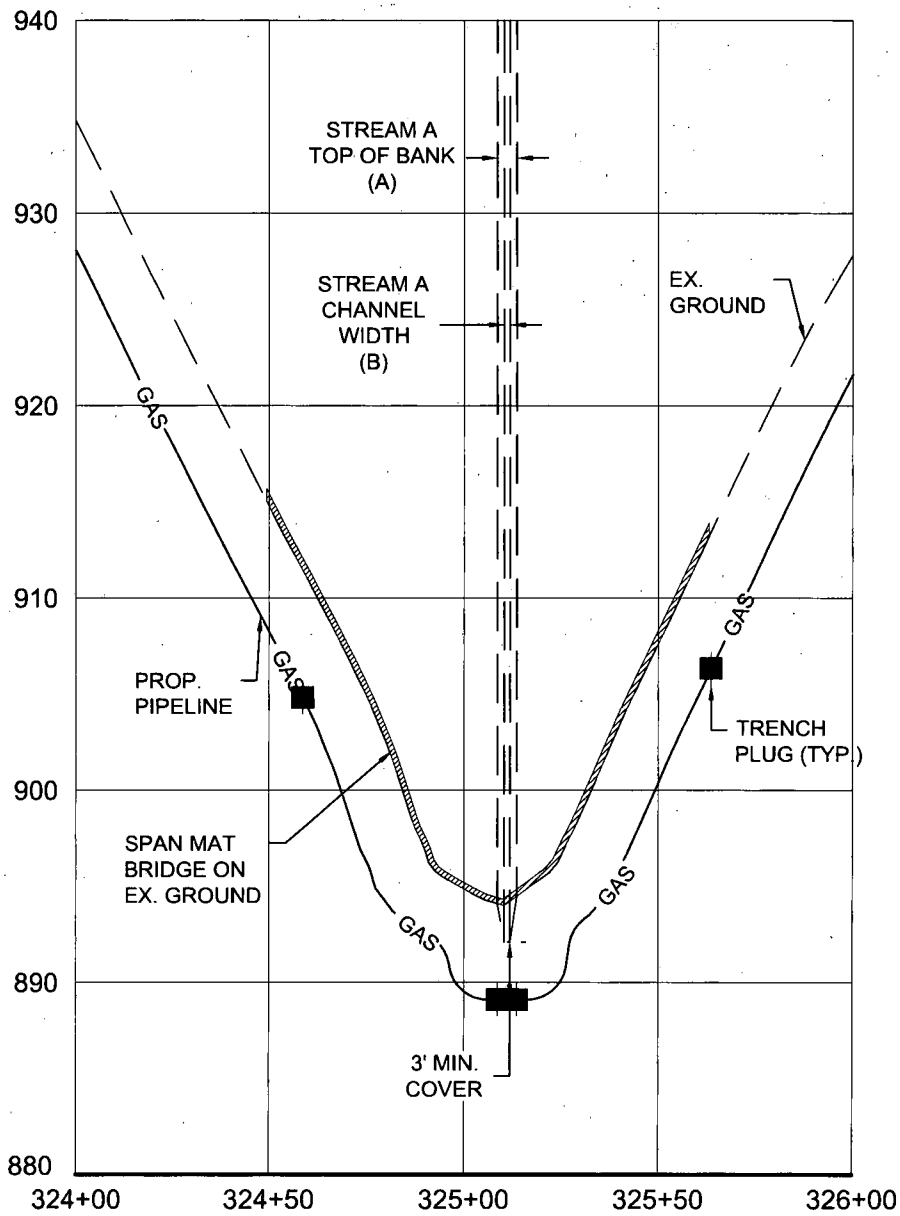
STREAM CROSSING #19
 PLAN
 Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date issued: JAN 2016
 Index Number:
 Drawn By: AAN
 Checked By: DMH
 Project Manager: DMH

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA
 PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
 The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #19
PROFILE

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN. 2016
Index Number:
Drawn By: JAH
Checked By: DMH
Project Manager: DMH

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

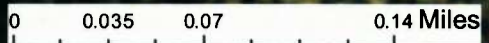
APPENDIX M

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	



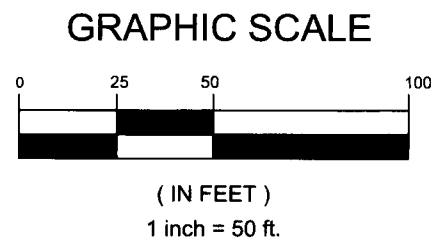
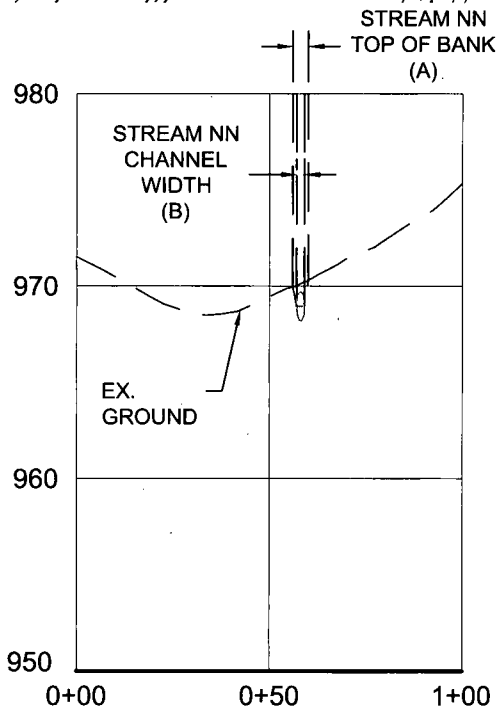
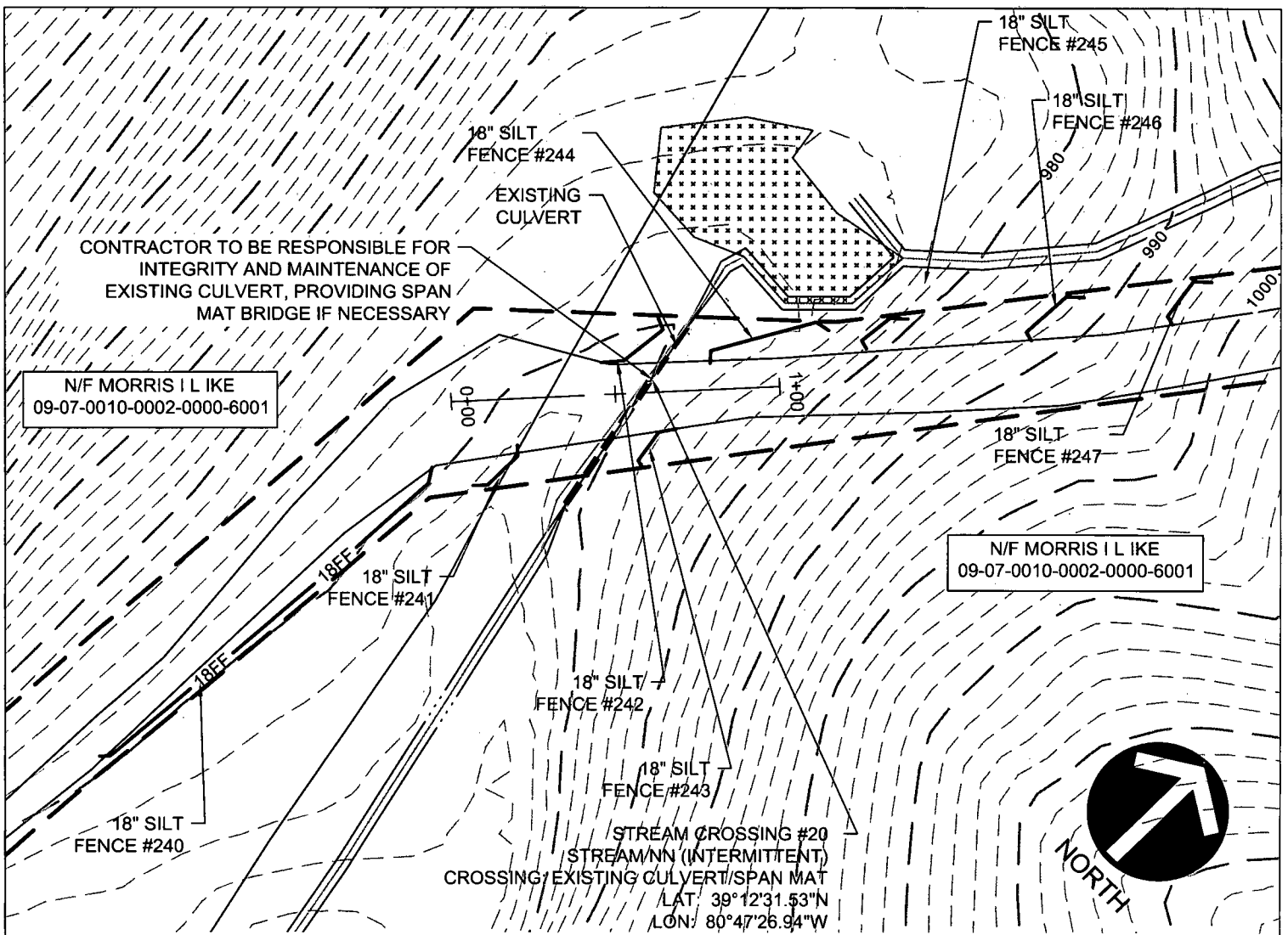
GATEWAY[®]
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

WV Flood Map Impact 19



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 19</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5031)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 894 ft</p> <p>Location (long, lat): (80.803999 W, 39.253641 N)</p> <p>Location (UTM 17N): (516912, 4344941)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



STREAM CROSSING #20
PLAN AND PROFILE

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN. 2016
Incar Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH

APPENDIX M

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY[®]

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 856-634-9284

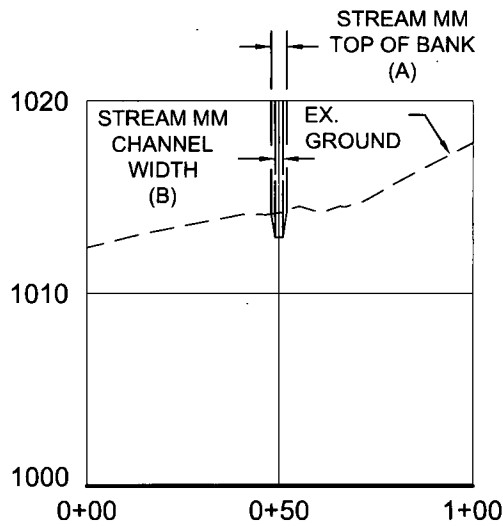
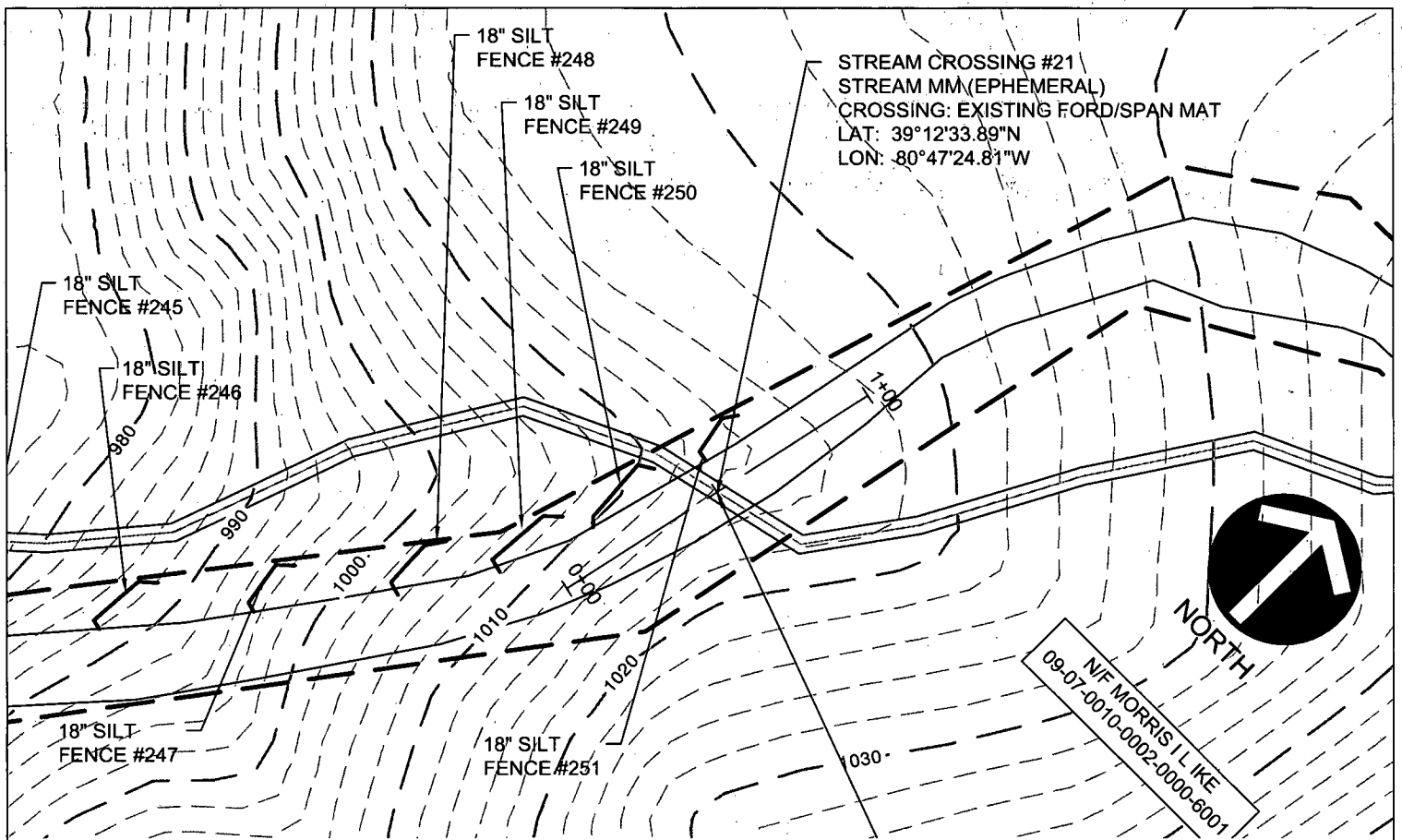
© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map Impact 20

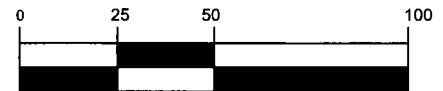


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p> Location of flood information</p> <p>User Notes: Impact 20</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Kanawha (5030203)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 969 ft</p> <p>Location (long, lat): (80.790819 W, 39.208758 N)</p> <p>Location (UTM 17N): (518060, 4339963)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	---	--



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #21
PLAN AND PROFILE

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN. 2018
Index Number:
Drawn By: JAH
Checked By: DMH
Project Manager: DMH

APPENDIX M

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-8284

WV Flood Map Impact 21

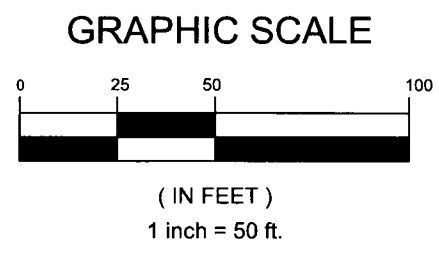
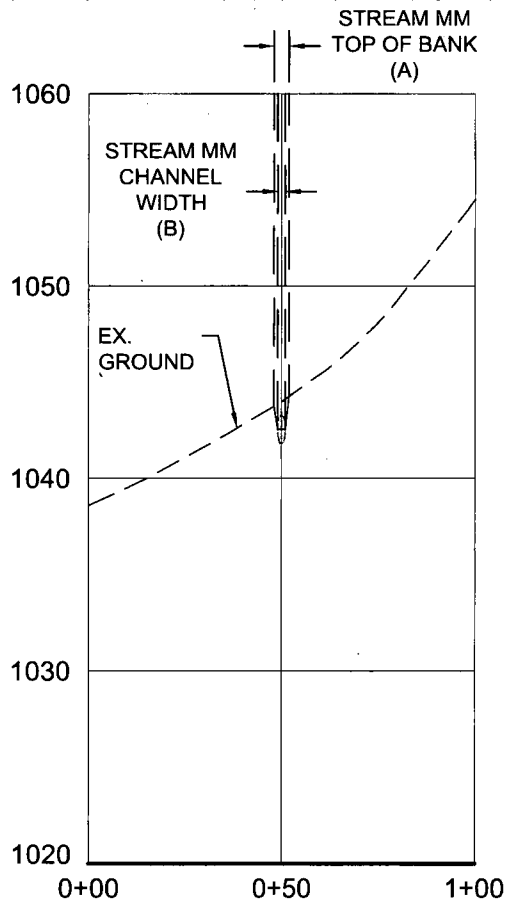
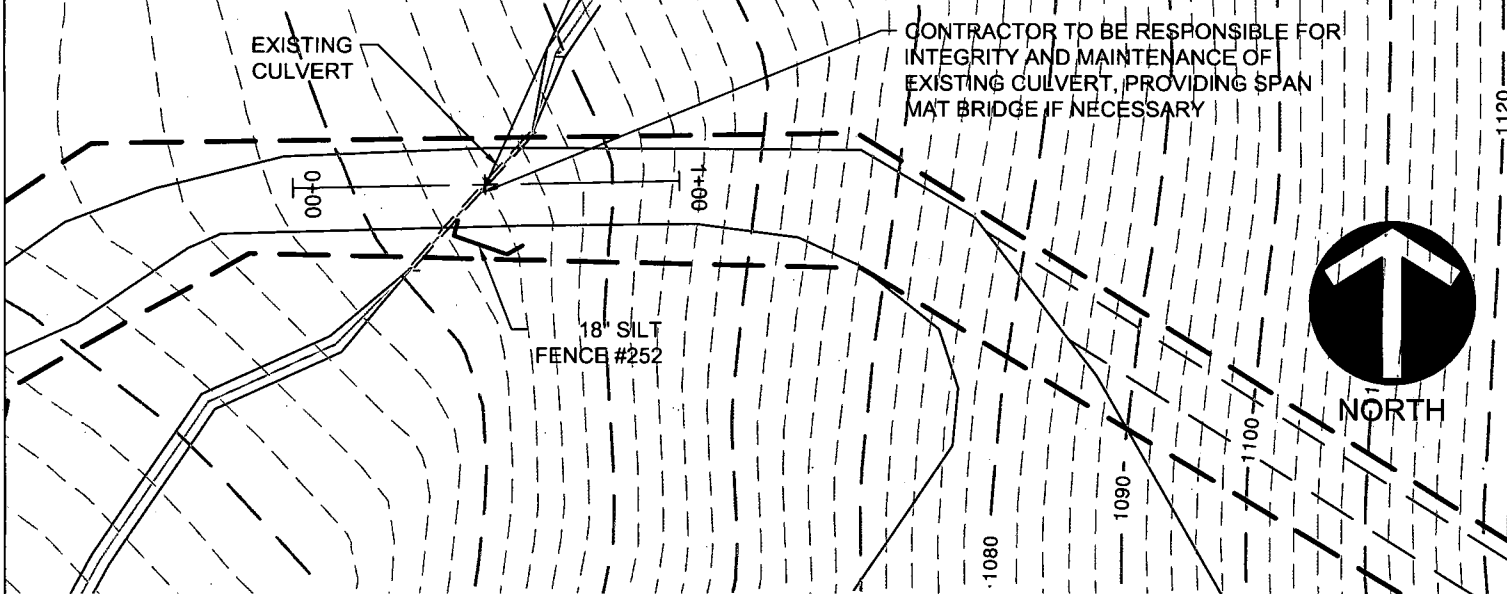


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p> <p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>		<p> Location of flood information</p> <p>User Notes: Impact 21</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Kanawha (5030203)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1013 ft</p> <p>Location (long, lat): (80.790225 W, 39.209414 N)</p> <p>Location (UTM 17N): (518111, 4340036)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
--	--	---	---

STREAM CROSSING #22
 STREAM MM (EPHEMERAL)
 CROSSING: EXISTING CULVERT / SPAN MAT
 LAT: 39°12'35.57"N
 LON: 80°47'22.69"W

N/F MORRIS I L I K E
 09-07-0010-0002-0000-6001



STREAM CROSSING #22
 PLAN AND PROFILE

Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN. 2016
 Index Number:
 Drawn By: AAN
 Checked By: DMH
 Project Manager: DMH

APPENDIX M

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

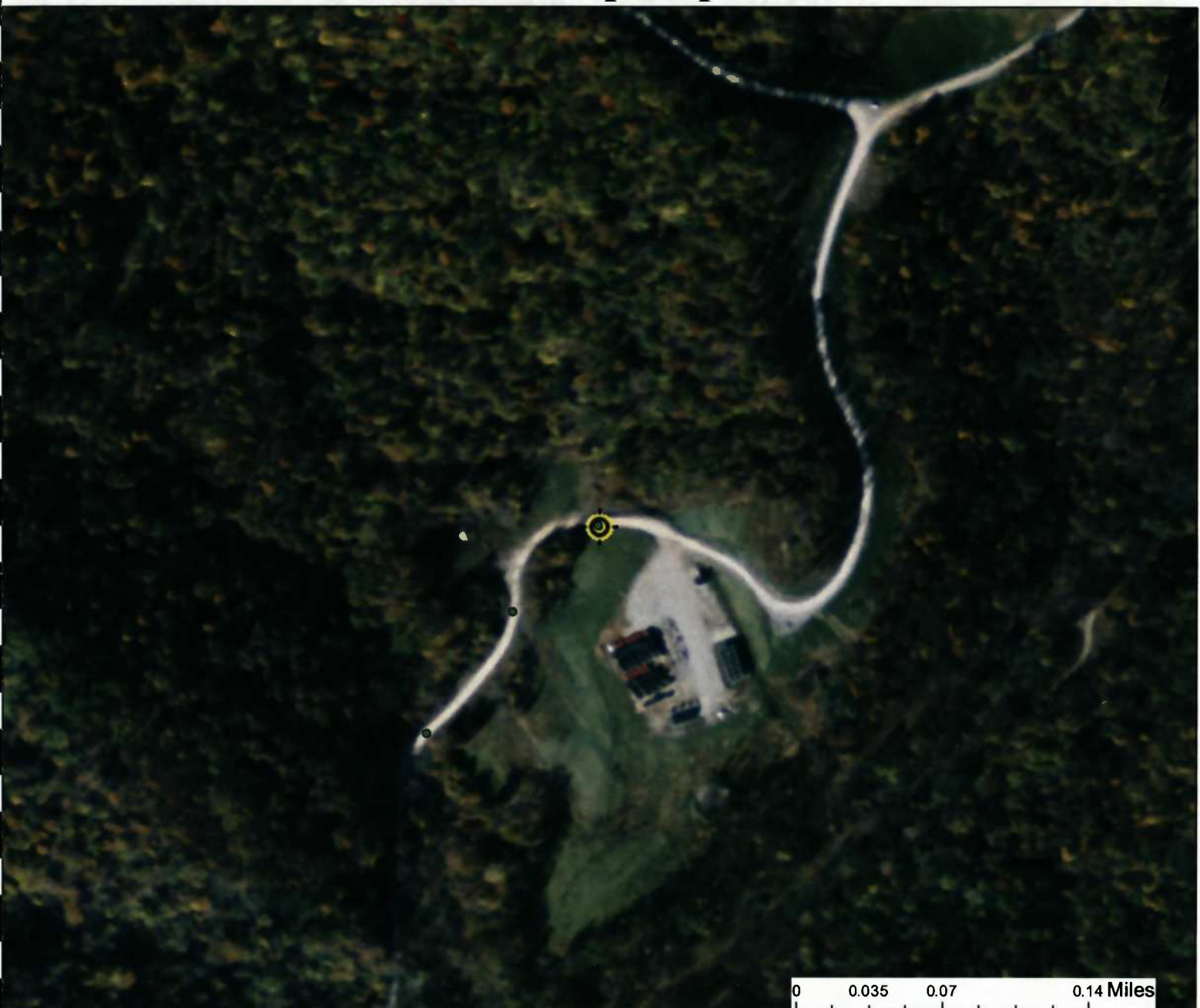
PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA
 gatewayengineers.com 855-634-9284

WV Flood Map Impact 22



0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 22</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Kanawha (5030203)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1043 ft</p> <p>Location (long, lat): (80.789635 W, 39.209881 N)</p> <p>Location (UTM 17N): (518162, 4340088)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

N/F HAMBLET WILLIAM
RANDALL
09-08-0023-0003-0001-3001



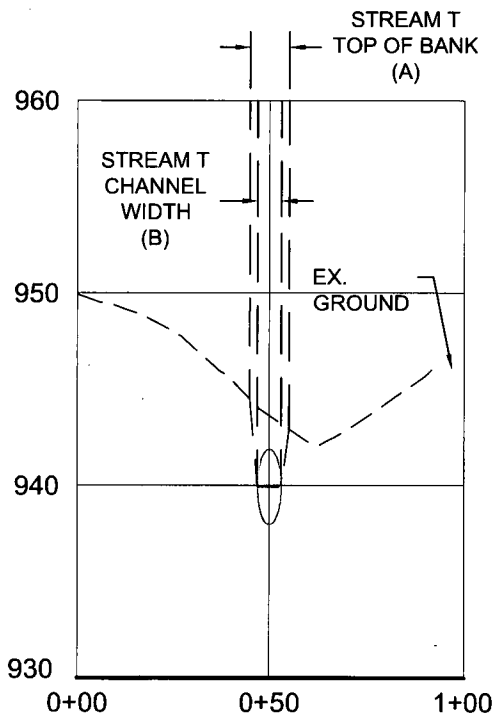
18" SILT
FENCE #257

STREAM CROSSING #23
STREAM T (PERENNIAL)
CROSSING: EXISTING CULVERT/SPAN MAT
LAT: 39°18'19.45"N
LON: 80°47'43.00"W

18" SILT
FENCE #256

EXISTING CULVERT

CONTRACTOR TO BE RESPONSIBLE FOR
INTEGRITY AND MAINTENANCE OF
EXISTING CULVERT, PROVIDING SPAN
MAT BRIDGE IF NECESSARY



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #23
PLAN AND PROFILE

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222



The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA

gatewayengineers.com 855-634-9284

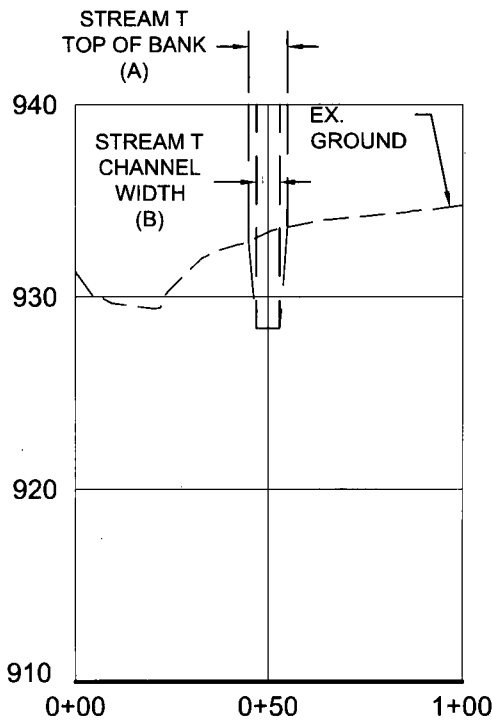
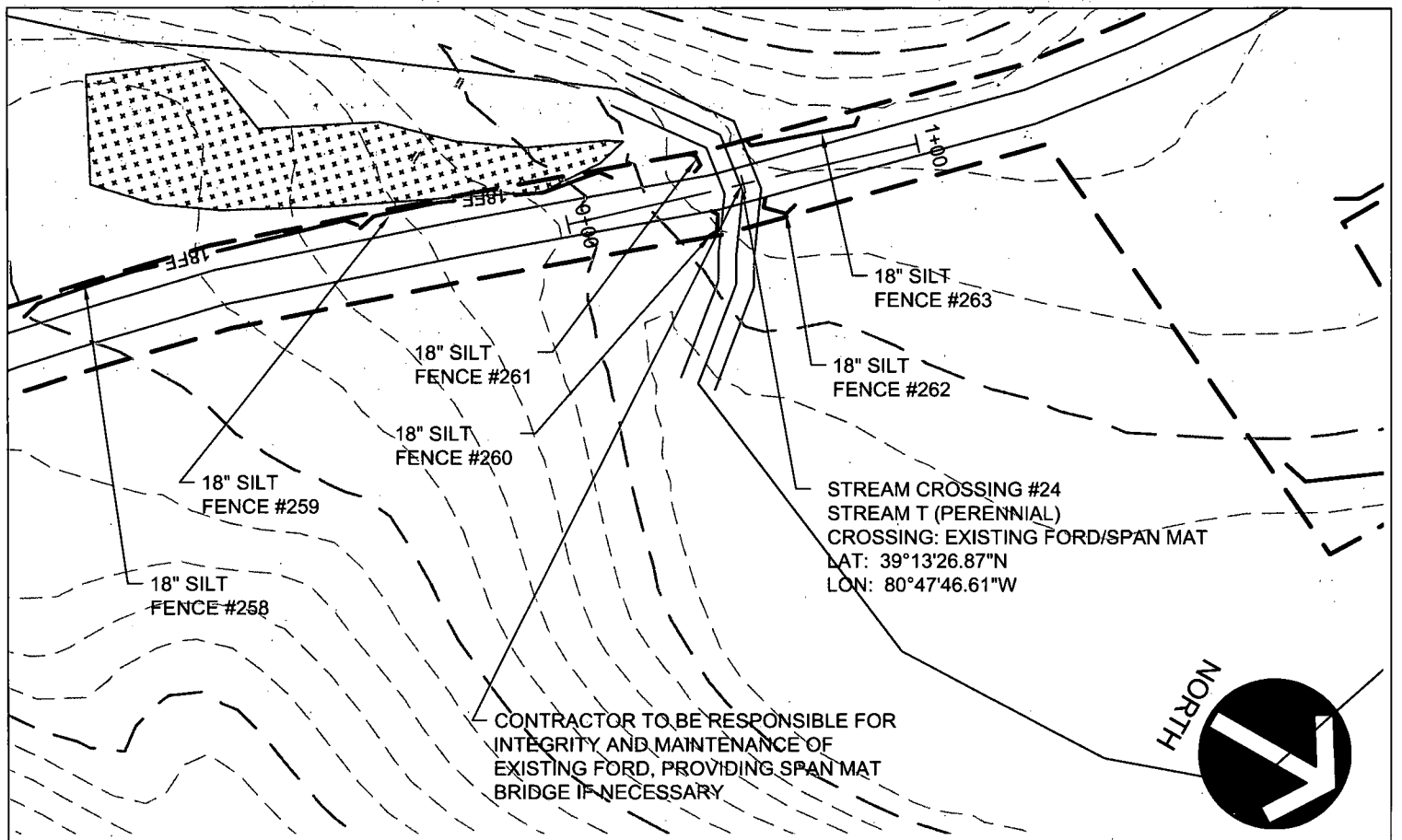
Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN. 2016
Index Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH
APPENDIX M

WV Flood Map Impact 23



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 23</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 945 ft</p> <p>Location (long, lat): (80.795281 W, 39.222068 N)</p> <p>Location (UTM 17N): (517672, 4341439)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #24
PLAN AND PROFILE

Project Number: 18422-0011
Drawing Scale: 3"=50'
Date Issued: JAN, 2016
Index Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

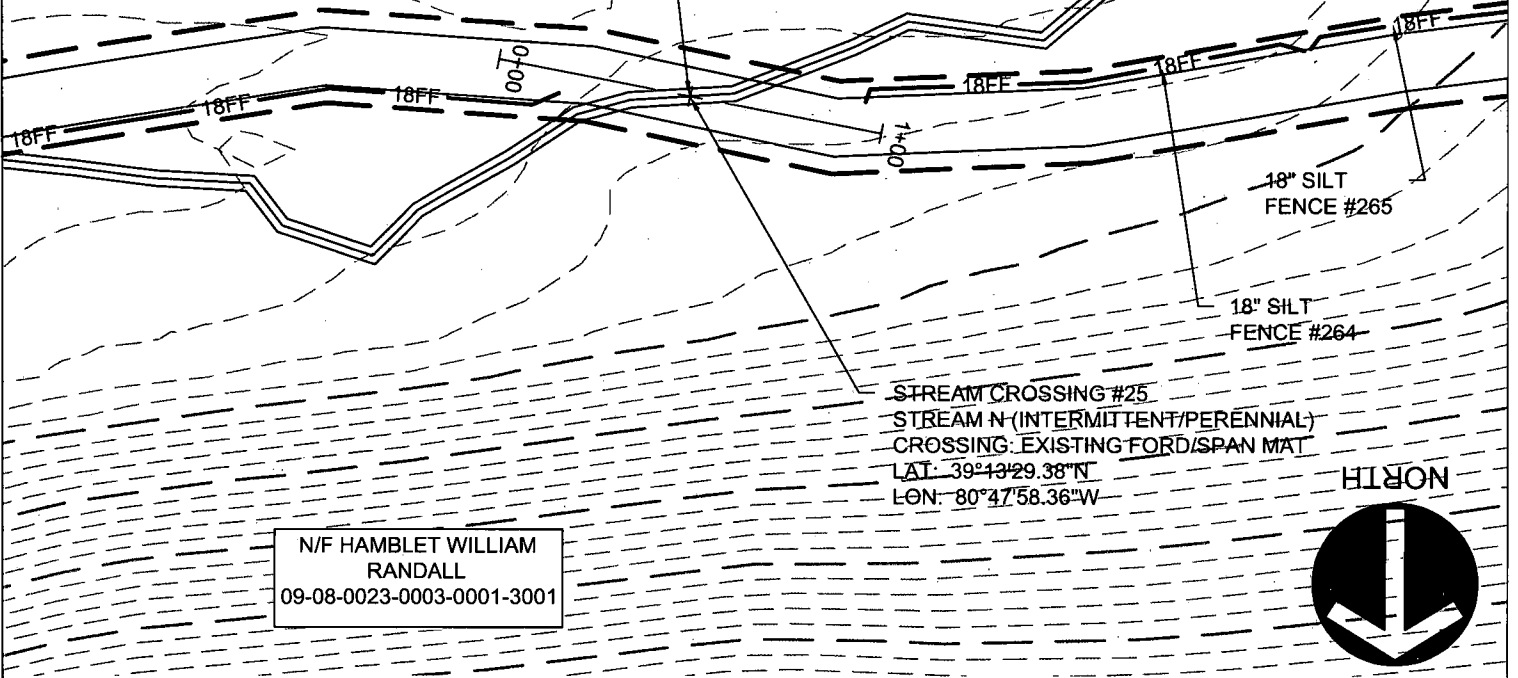
WV Flood Map Impact 24



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 24</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5031)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 934 ft</p> <p>Location (long, lat): (80.796283 W, 39.224132 N)</p> <p>Location (UTM 17N): (517585, 4341668)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

CONTRACTOR TO BE RESPONSIBLE FOR
INTEGRITY AND MAINTENANCE OF
EXISTING FORD, PROVIDING SPAN MAT
BRIDGE IF NECESSARY

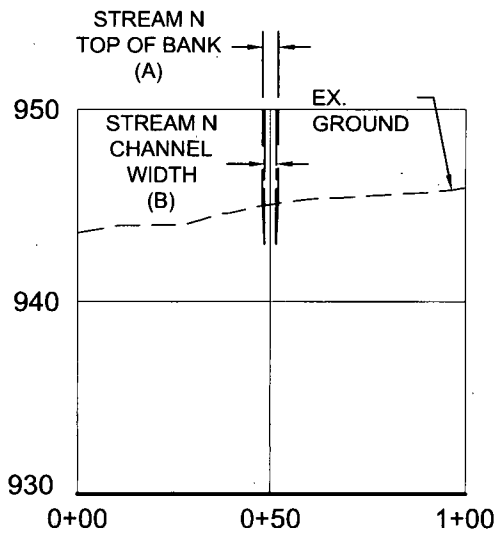


STREAM CROSSING #25
STREAM N (INTERMITTENT/PERENNIAL)
CROSSING: EXISTING FORD/SPAN MAT
LAT: 39°43'29.38"N
LON: 80°47'58.36"W

NORTH



N/F HAMBLET WILLIAM
RANDALL
09-08-0023-0003-0001-3001



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #25
PLAN AND PROFILE

Project Number: 18422-0011
Date Issued: JAN. 2018
Index Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

APPENDIX M

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	



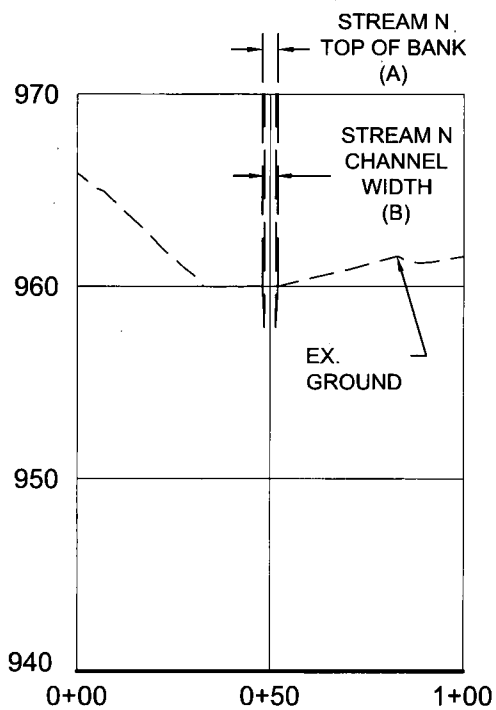
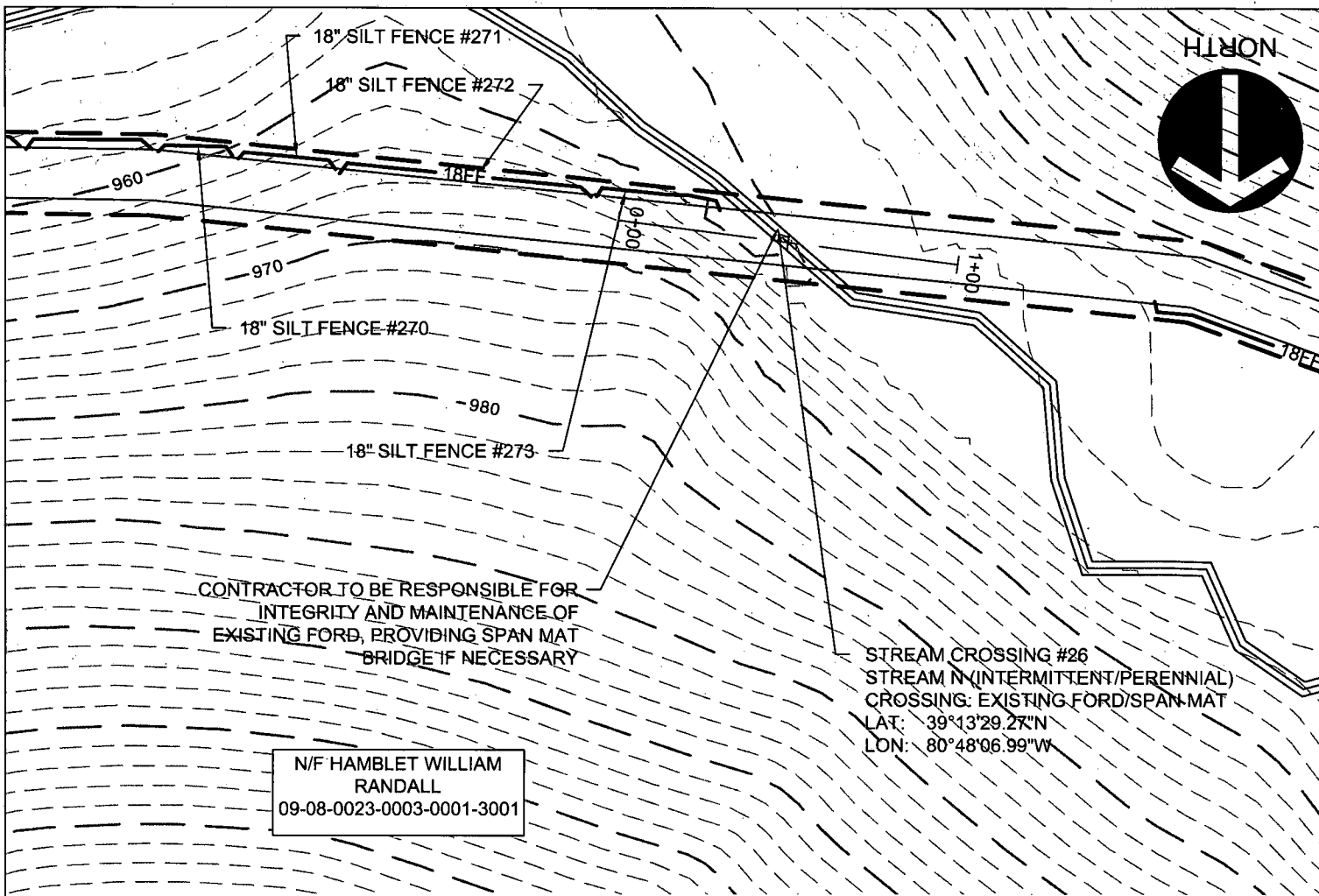
GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

WV Flood Map Impact 25

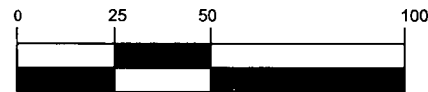


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 25</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 945 ft</p> <p>Location (long, lat): (80.799545 W, 39.224829 N)</p> <p>Location (UTM 17N): (517303, 4341745)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #26
PLAN AND PROFILE

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2016
Index Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH

APPENDIX M

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA

gatewayengineers.com

855-634-9284

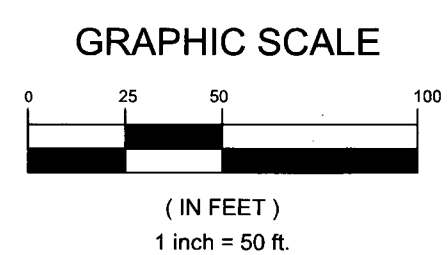
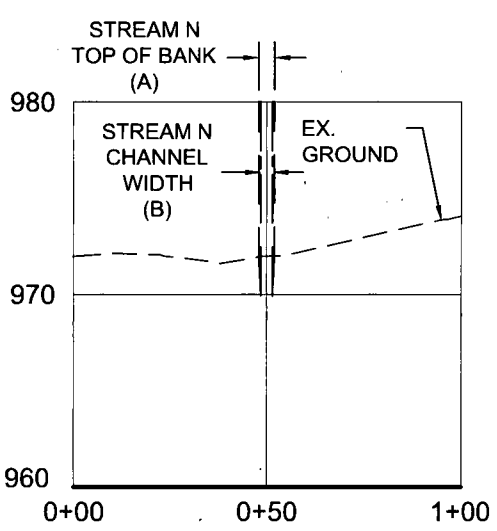
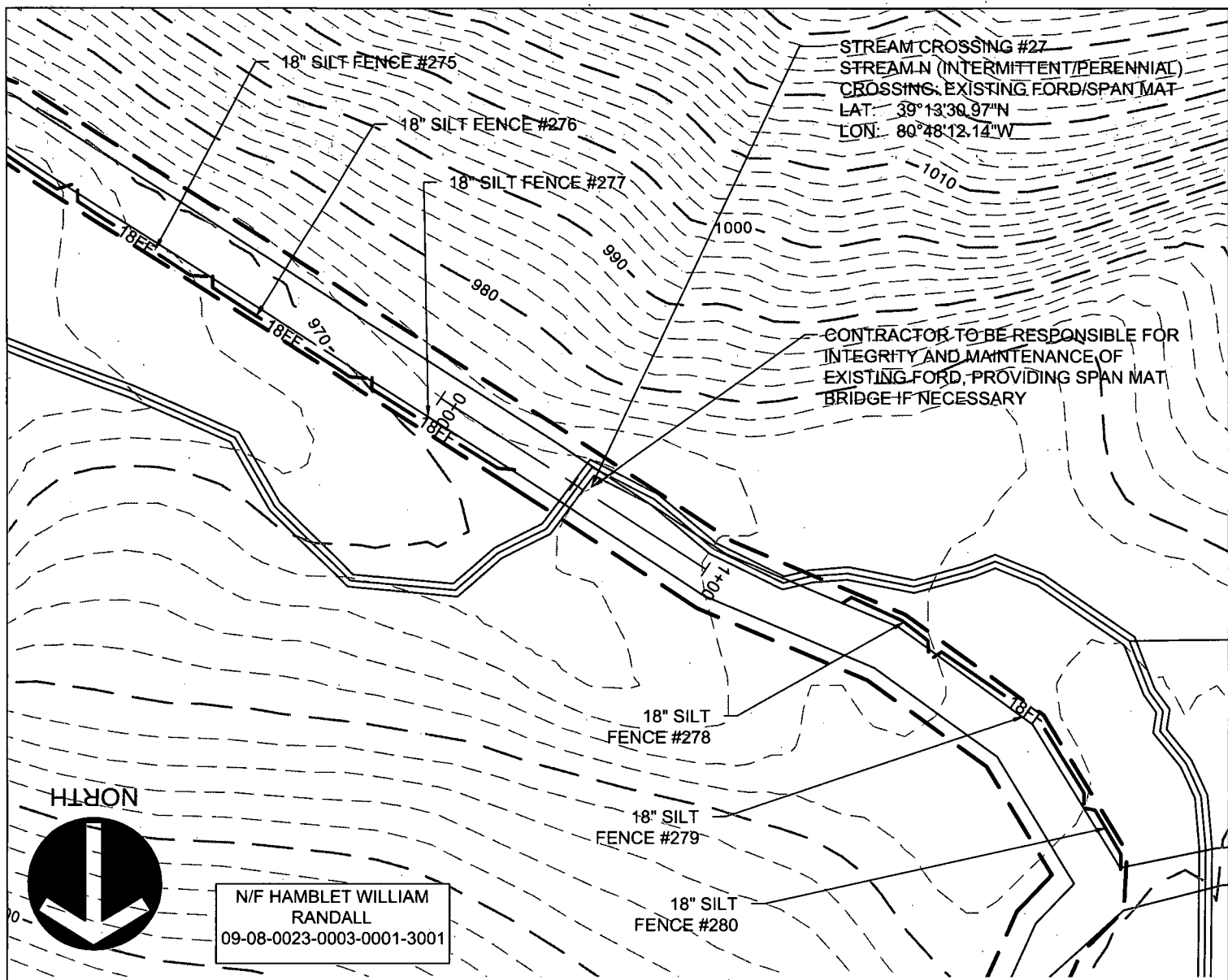
WV Flood Map Impact 26



0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 26</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 945 ft</p> <p>Location (long, lat): (80.799545 W, 39.224829 N)</p> <p>Location (UTM 17N): (517303, 4341745)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



STREAM CROSSING #27
PLAN AND PROFILE

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2016
Index Number:
Drawn By: JAH
Checked By: DMH
Project Manager: DMH

APPENDIX M

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY[®]

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA

gatewayengineers.com 855-634-9284

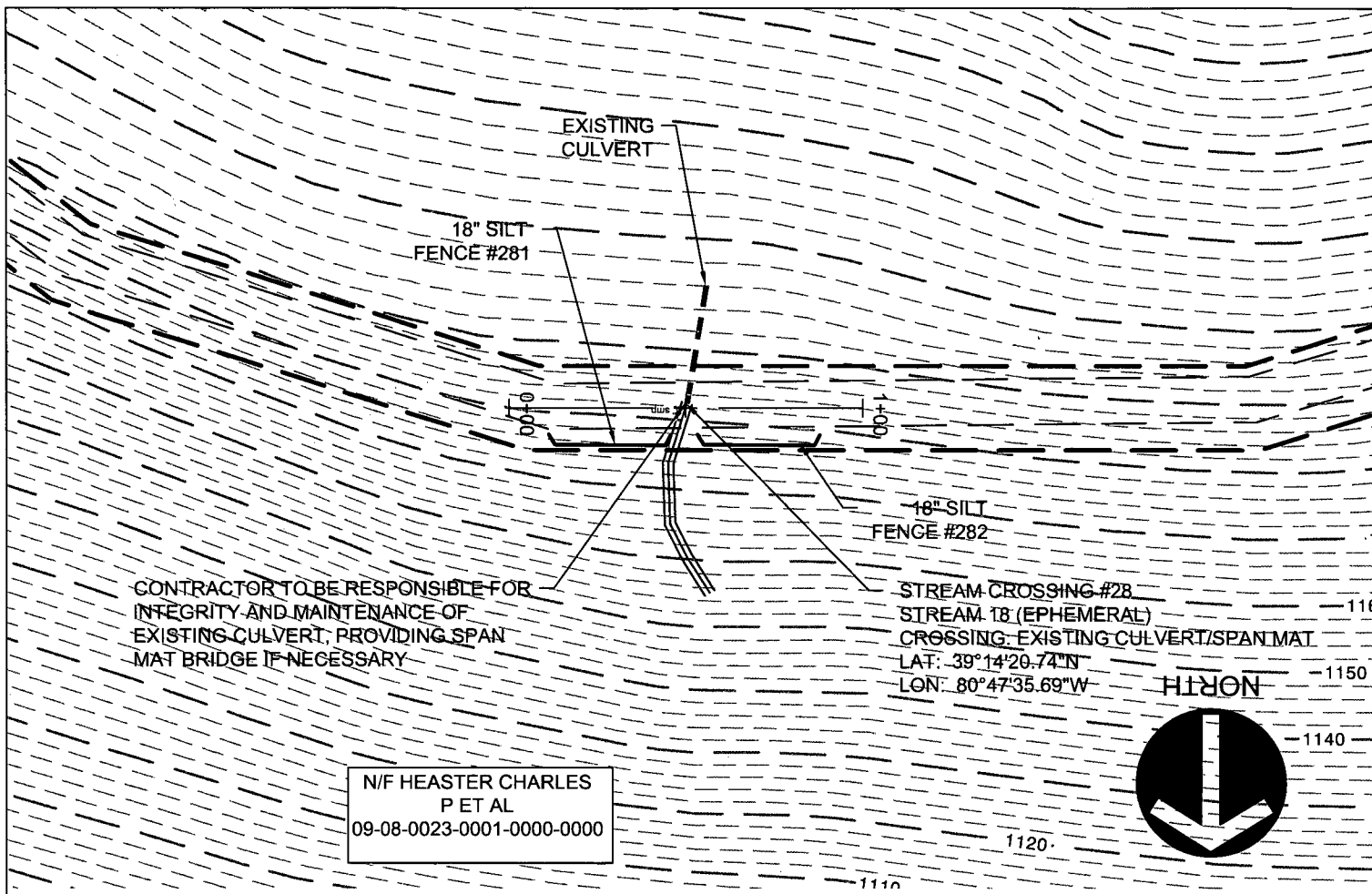
© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map Impact 27

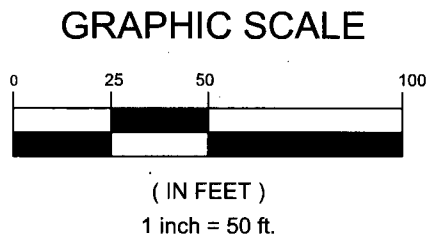
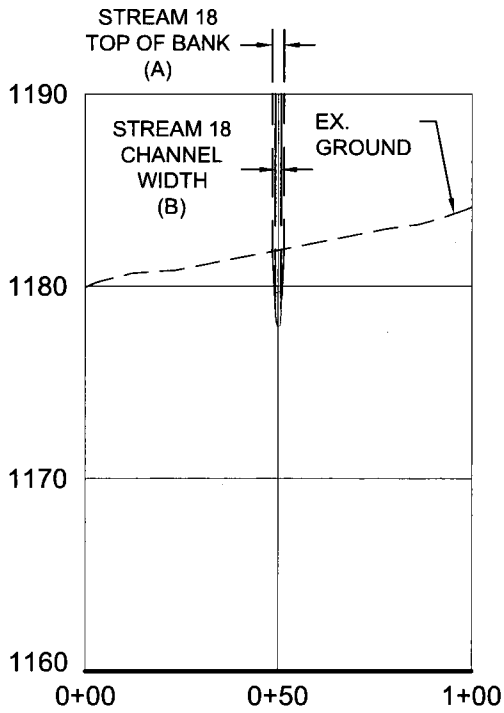


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 27</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5031)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 972 ft</p> <p>Location (long, lat): (80.803371 W, 39.225268 N)</p> <p>Location (UTM 17N): (516973, 4341793)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



N/F HEASTER CHARLES
 P ET AL
 09-08-0023-0001-0000-0000



STREAM CROSSING #28
 PLAN AND PROFILE

Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN. 2016
 Index Number:
 Drawn By: AAN
 Checked By: DMH
 Project Manager: DMH

APPENDIX M

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No.	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

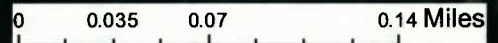
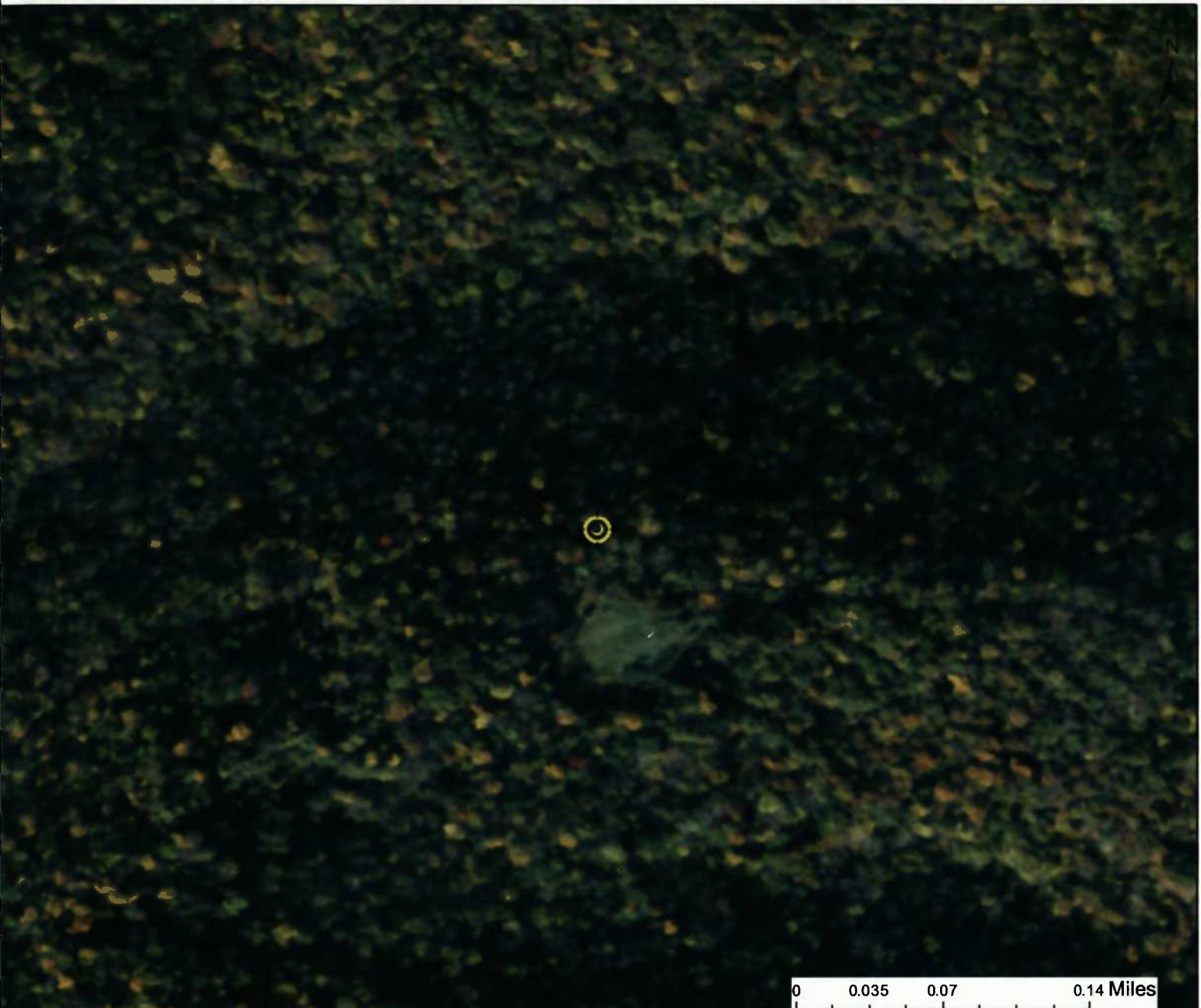
GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA

gatewayengineers.com 855-634-9284

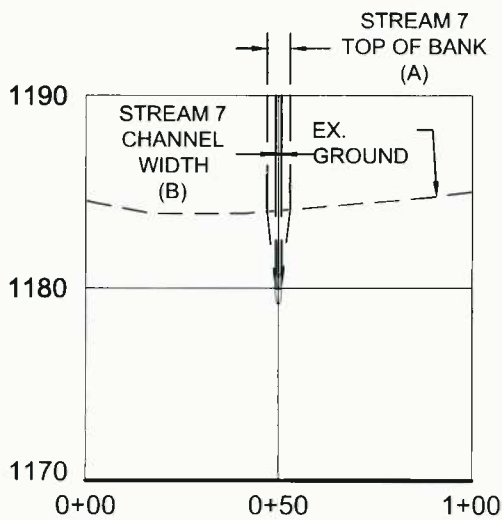
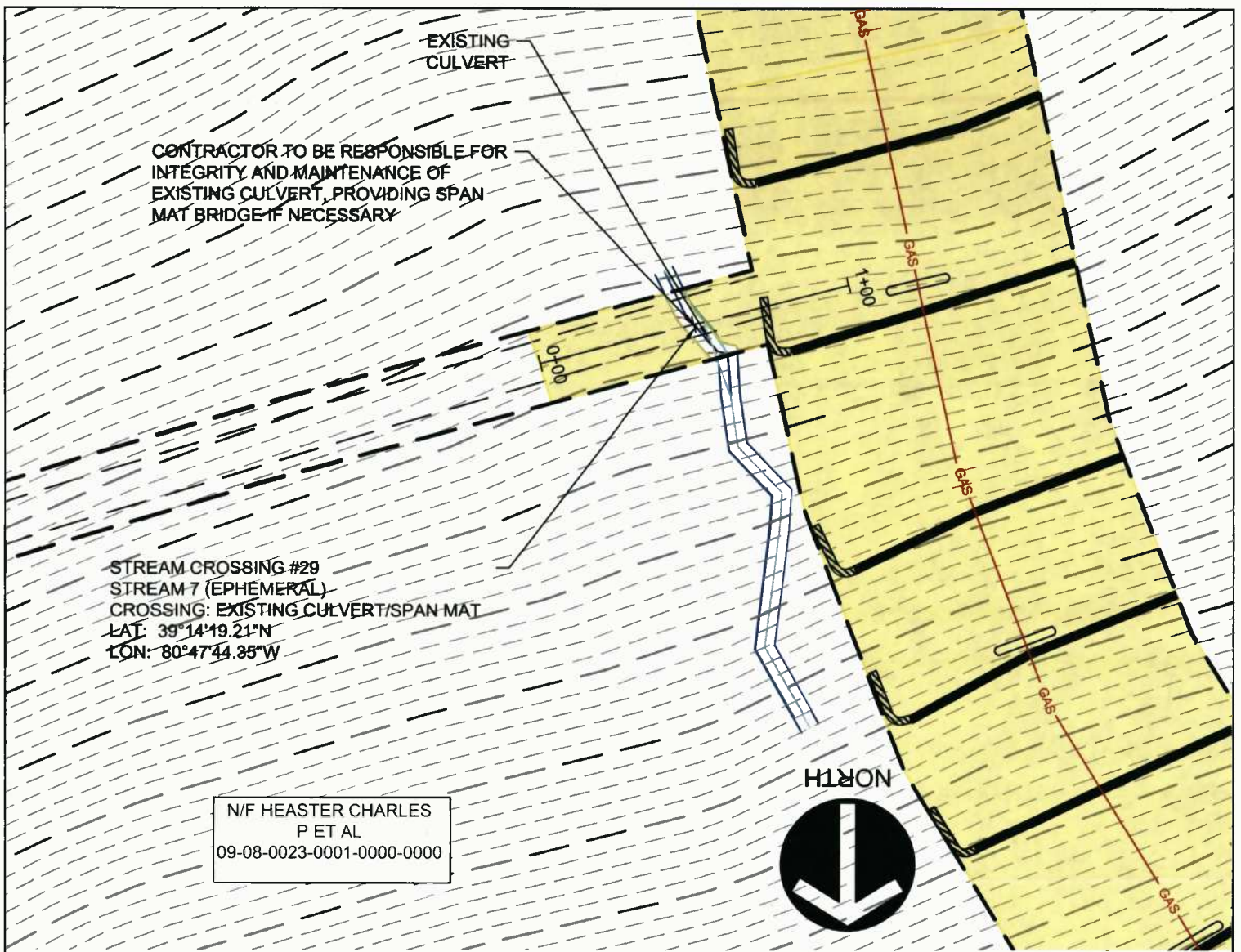
© Gateway Engineers, Inc. All Rights Reserved

WV Flood Map Impact 28

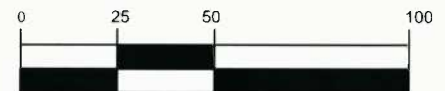


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 28</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1187 ft</p> <p>Location (long, lat): (80.793249 W, 39.239094 N)</p> <p>Location (UTM 17N): (517843, 4343329)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



GRAPHIC SCALE



(IN FEET)
 1 inch = 50 ft.

STREAM CROSSING #29
 PLAN AND PROFILE

Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN, 2016
 Index Number:
 Drawn By: AAN
 Checked By: DMH
 Project Manager: DMH

APPENDIX M

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

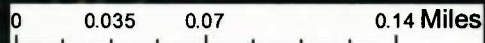
Date	No.	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA

gatewayengineers.com 855-634-9284

WV Flood Map Impact 29



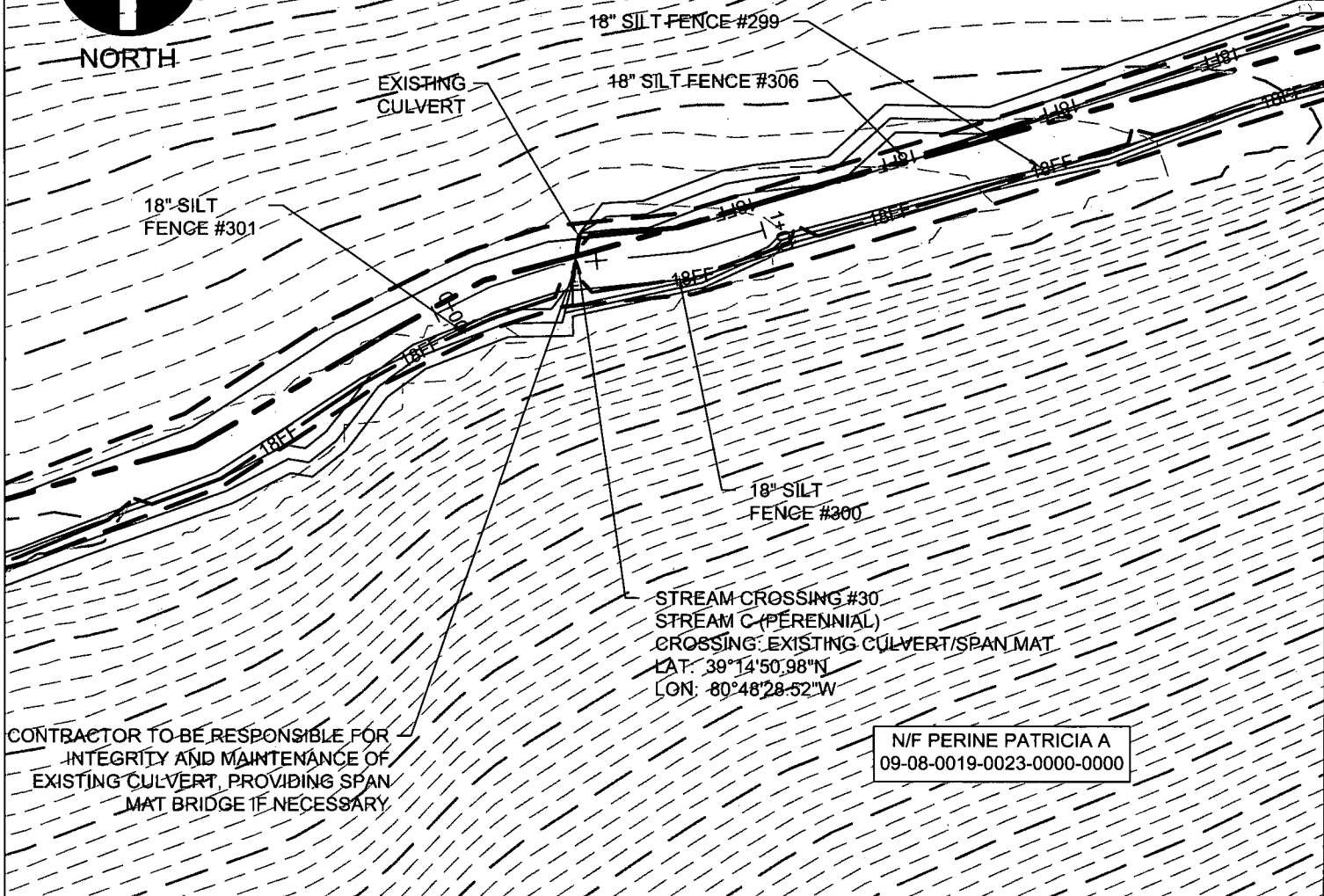
This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 29</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5034)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 1182 ft</p> <p>Location (long, lat): (80.795665 W, 39.238676 N)</p> <p>Location (UTM 17N): (517634, 4343282)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			



NORTH

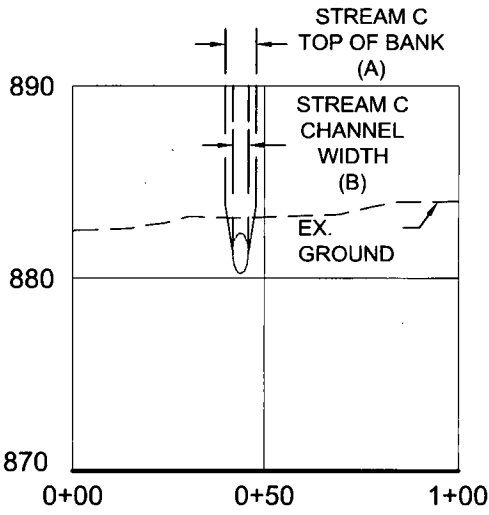
N/F PERINE PATRICIA A
09-08-0019-0023-0003-0000



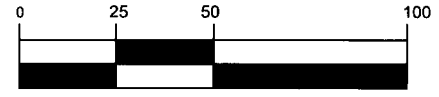
STREAM CROSSING #30
STREAM C (PERENNIAL)
CROSSING EXISTING CULVERT/SPAN MAT
LAT: 39°14'50.98"N
LON: 80°48'28.52"W

CONTRACTOR TO BE RESPONSIBLE FOR
INTEGRITY AND MAINTENANCE OF
EXISTING CULVERT, PROVIDING SPAN
MAT BRIDGE IF NECESSARY

N/F PERINE PATRICIA A
09-08-0019-0023-0000-0000



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #30
PLAN AND PROFILE
Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN, 2016
Index Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-

GATEWAY
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284








© Gateway Engineers Inc. All Rights Reserved

WV Flood Map Impact 30

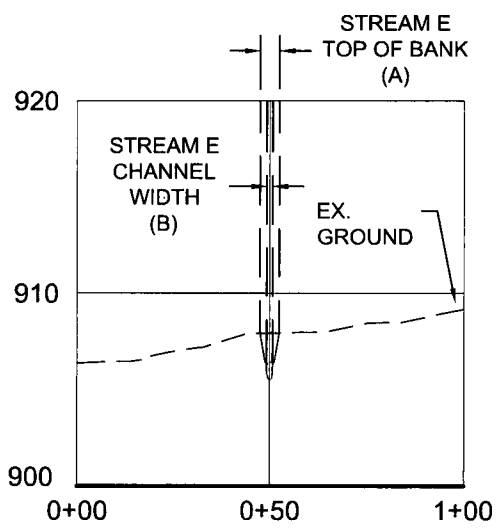
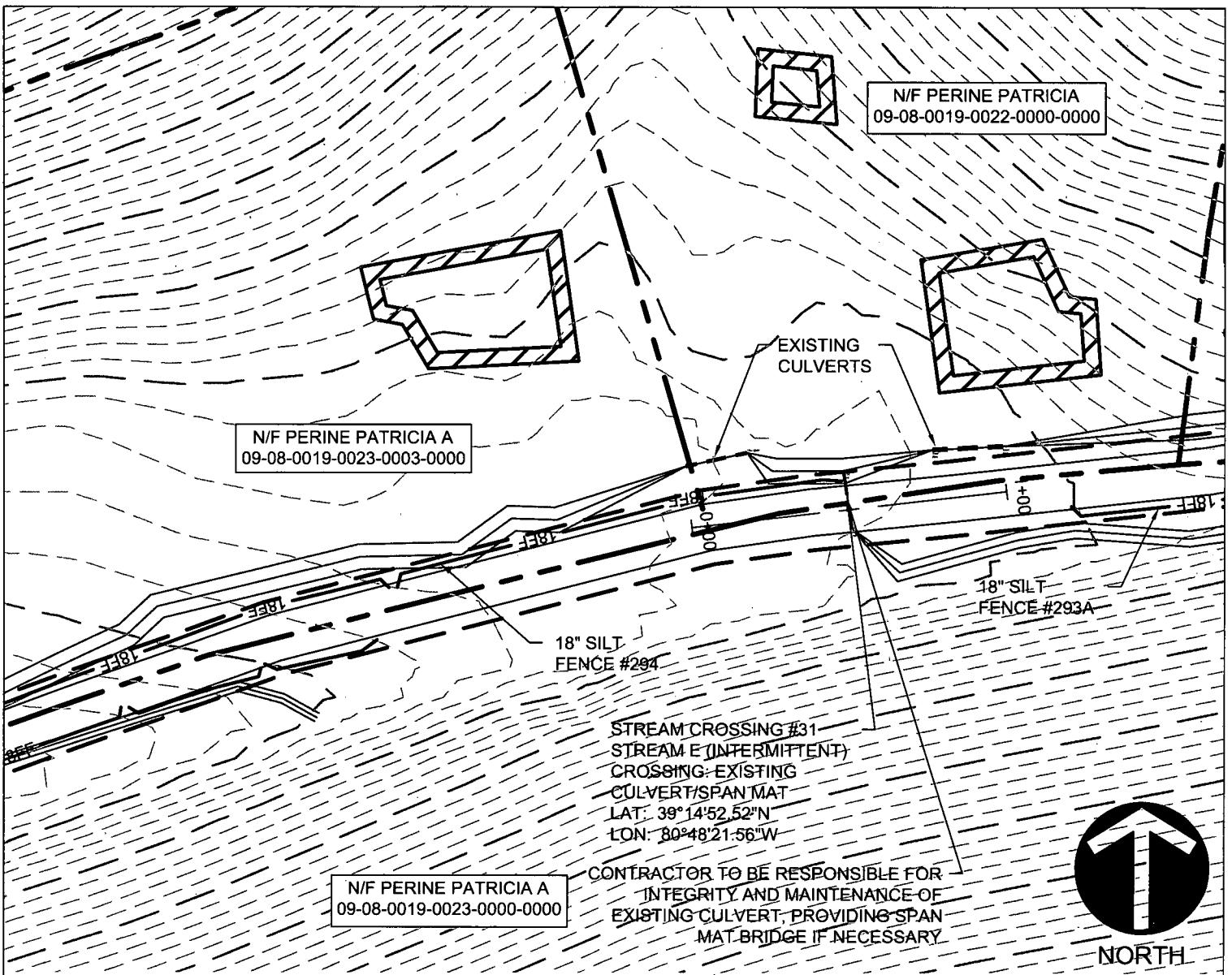


This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

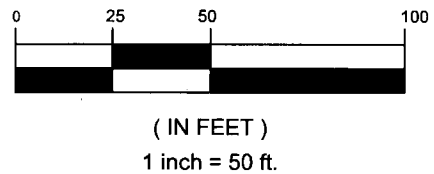
Map created on January 8, 2016

	Cross Section (XS) Lines		Location of flood information
	Base Flood Elevation (BFE) Lines	User Notes:	
	Floodway		Impact 30
Flood Hazard Zone			
	Approximate Study (Zone A)		
	Detailed Study (AE, AH, AO)		
	Community Rating System Areas		
Disclaimer:			
The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov . WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.			

Flood Hazard Area:	
Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard	
Flood Hazard Zone:	N/A
Stream:	N/A
FEMA Issued Flood Map:	54017C0225C
Watershed (HUC8):	Little Musringum-Middle Island (5031
Advisory Flood Height:	N/A
Water Depth:	N/A
Elevation:	About 882 ft
Location (long, lat):	(80.807924 W, 39.247494 N)
Location (UTM 17N):	(516574, 4344259)
Contacts:	Doddridge
CRS Information:	N/A
Flood Profile:	N/A
HEC-RAS Model:	N/A
Parcel Number:	



GRAPHIC SCALE



STREAM CROSSING #31
PLAN AND PROFILE

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2016
Index Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH

APPENDIX M

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

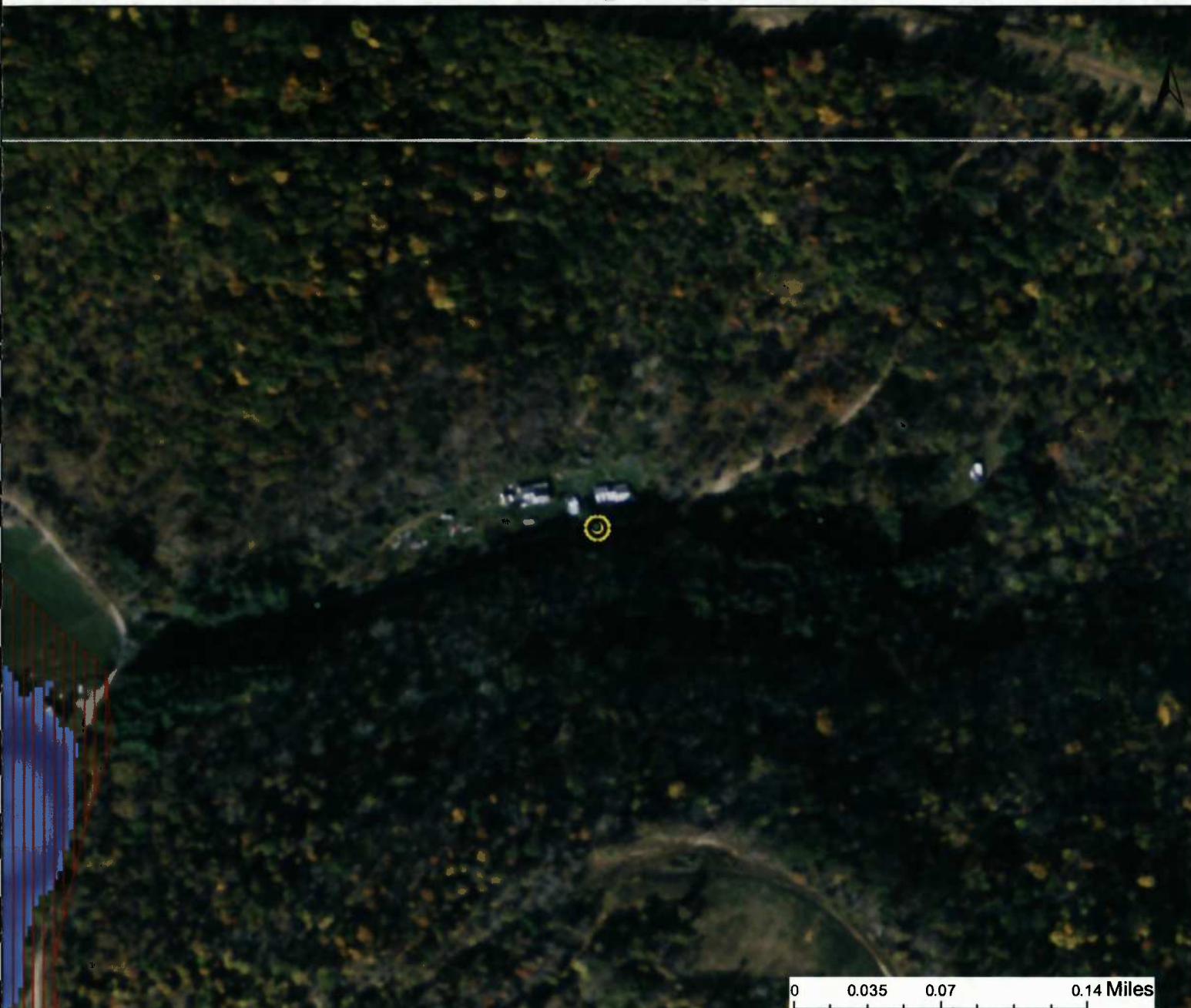
Date	No.	REVISION RECORD
-	01	
-	02	
-	03	
-	04	
-	05	
-	06	
-	07	
-	08	

GATEWAY[®]

The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284

© Gateway Engineers Inc. All Rights Reserved

WV Flood Map Impact 31



This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 31</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0225C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (5030)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 908 ft</p> <p>Location (long, lat): (80.805992 W, 39.247922 N)</p> <p>Location (UTM 17N): (516741, 4344306)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

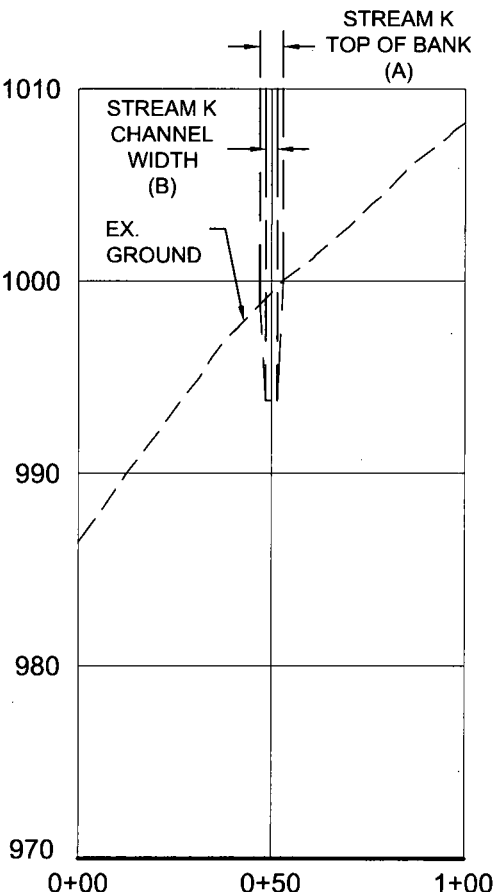
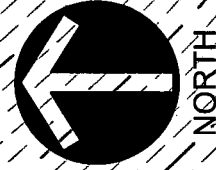
STREAM CROSSING #32
 STREAM K (EPHEMERAL)
 CROSSING: EXISTING FORD/SPAN MAT
 LAT: 39°15'09.83"N
 LON: 80°48'18.86"W

N/F BRITTON MICHAEL R
 09-08-0019-0015-0000-0000

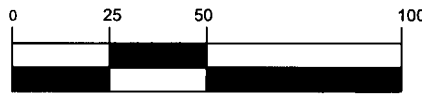
SUPER SILT
 FENCE #309

SUPER SILT
 FENCE #308

CONTRACTOR TO BE RESPONSIBLE FOR
 INTEGRITY AND MAINTENANCE OF
 EXISTING FORD, PROVIDING SPAN MAT
 BRIDGE IF NECESSARY



GRAPHIC SCALE



(IN FEET)
 1 inch = 50 ft.

STREAM CROSSING #32
 PLAN AND PROFILE

Project Number: 18422-0011
 Drawing Scale: 1"=50'
 Date Issued: JAN. 2016
 Issue Number:
 Drawn By: AAN
 Checked By: DMH
 Project Manager: DMH

APPENDIX M

MOSA S033 PIPELINE
 DODDRIDGE COUNTY, WEST VIRGINIA

PREPARED FOR:
EQM GATHERING OPCO, LLC
 625 LIBERTY AVENUE
 PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]

The Gateway Engineers, Inc.
 Full-Service Civil Engineering & Surveying
 Pittsburgh, PA

gatewayengineers.com 855-634-9284

© Gateway Engineers, Inc. All Rights Reserved

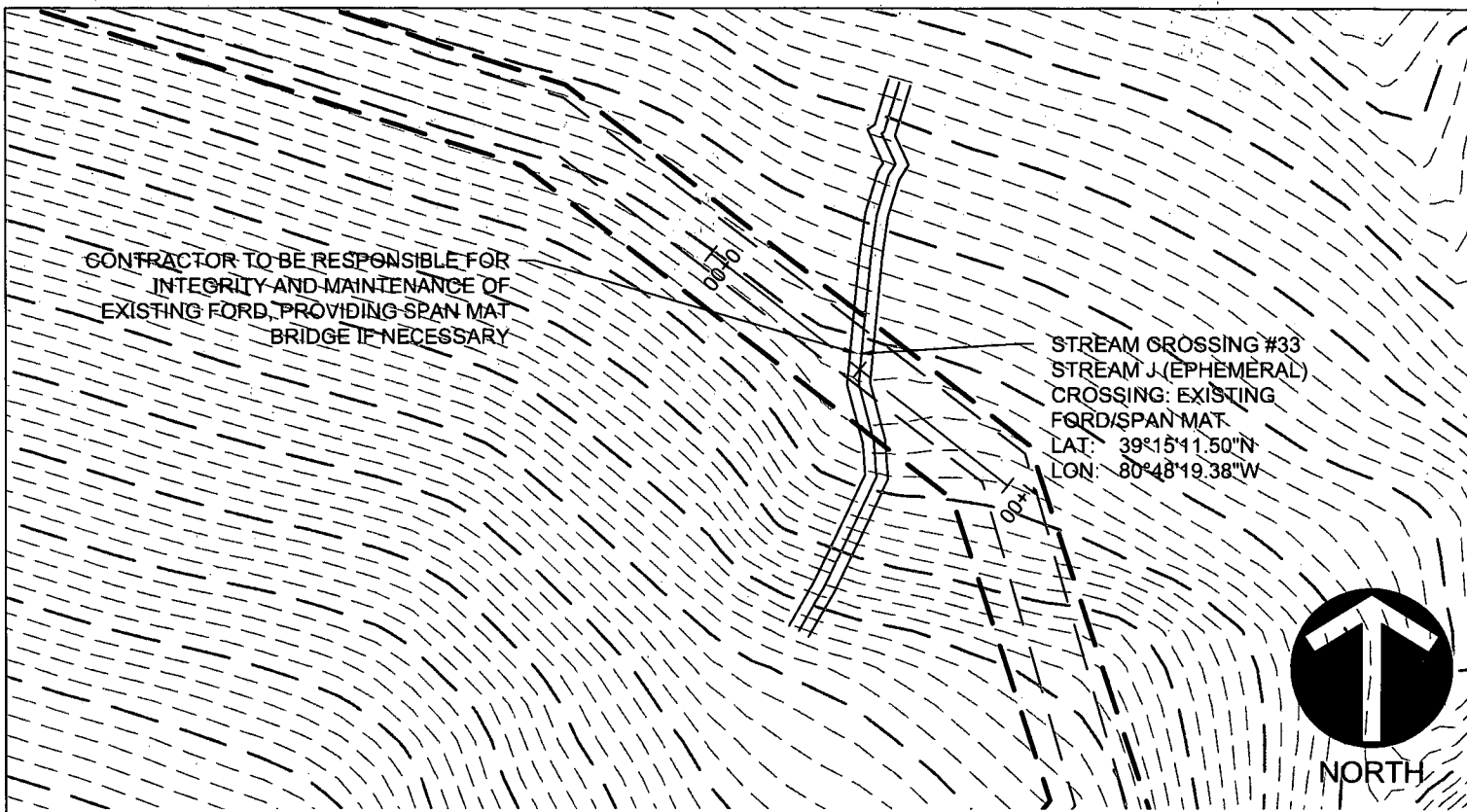
WV Flood Map Impact 32



0 0.035 0.07 0.14 Miles

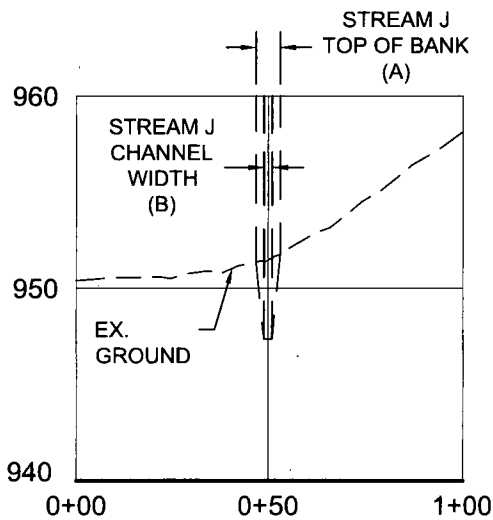
This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

<p> Cross Section (XS) Lines</p> <p> Base Flood Elevation (BFE) Lines</p> <p> Floodway</p> <p>Flood Hazard Zone</p> <p> Approximate Study (Zone A)</p> <p> Detailed Study (AE, AH, AO)</p> <p> Community Rating System Areas</p>		<p> Location of flood information</p> <p>User Notes: Impact 32</p>	<p style="text-align: right;"><i>Map created on January 8, 2016</i></p> <p>Flood Hazard Area: Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard</p> <p>Flood Hazard Zone: N/A</p> <p>Stream: N/A</p> <p>FEMA Issued Flood Map: 54017C0120C</p> <p>Watershed (HUC8): Little Musringum-Middle Island (503)</p> <p>Advisory Flood Height: N/A</p> <p>Water Depth: N/A</p> <p>Elevation: About 997 ft</p> <p>Location (long, lat): (80.805241 W, 39.252731 N)</p> <p>Location (UTM 17N): (516805, 4344840)</p> <p>Contacts: Doddridge</p> <p>CRS Information: N/A</p> <p>Flood Profile: N/A</p> <p>HEC-RAS Model: N/A</p> <p>Parcel Number:</p>
<p>Disclaimer: The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov. <i>WV Flood Tool (http://www.MapWV.gov/flood) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.</i></p>			

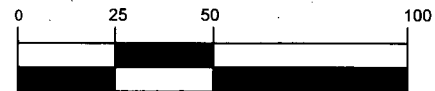


CONTRACTOR TO BE RESPONSIBLE FOR
INTEGRITY AND MAINTENANCE OF
EXISTING FORD, PROVIDING SPAN MAT
BRIDGE IF NECESSARY

STREAM CROSSING #33
STREAM J (EPHEMERAL)
CROSSING: EXISTING
FORD/SPAN MAT
LAT: 39°15'11.50"N
LON: 80°48'19.38"W



GRAPHIC SCALE



(IN FEET)
1 inch = 50 ft.

STREAM CROSSING #33
PLAN AND PROFILE

Project Number: 18422-0011
Drawing Scale: 1"=50'
Date Issued: JAN 2016
Inset Number:
Drawn By: AAN
Checked By: DMH
Project Manager: DMH

MOSA S033 PIPELINE
DODDRIDGE COUNTY, WEST VIRGINIA

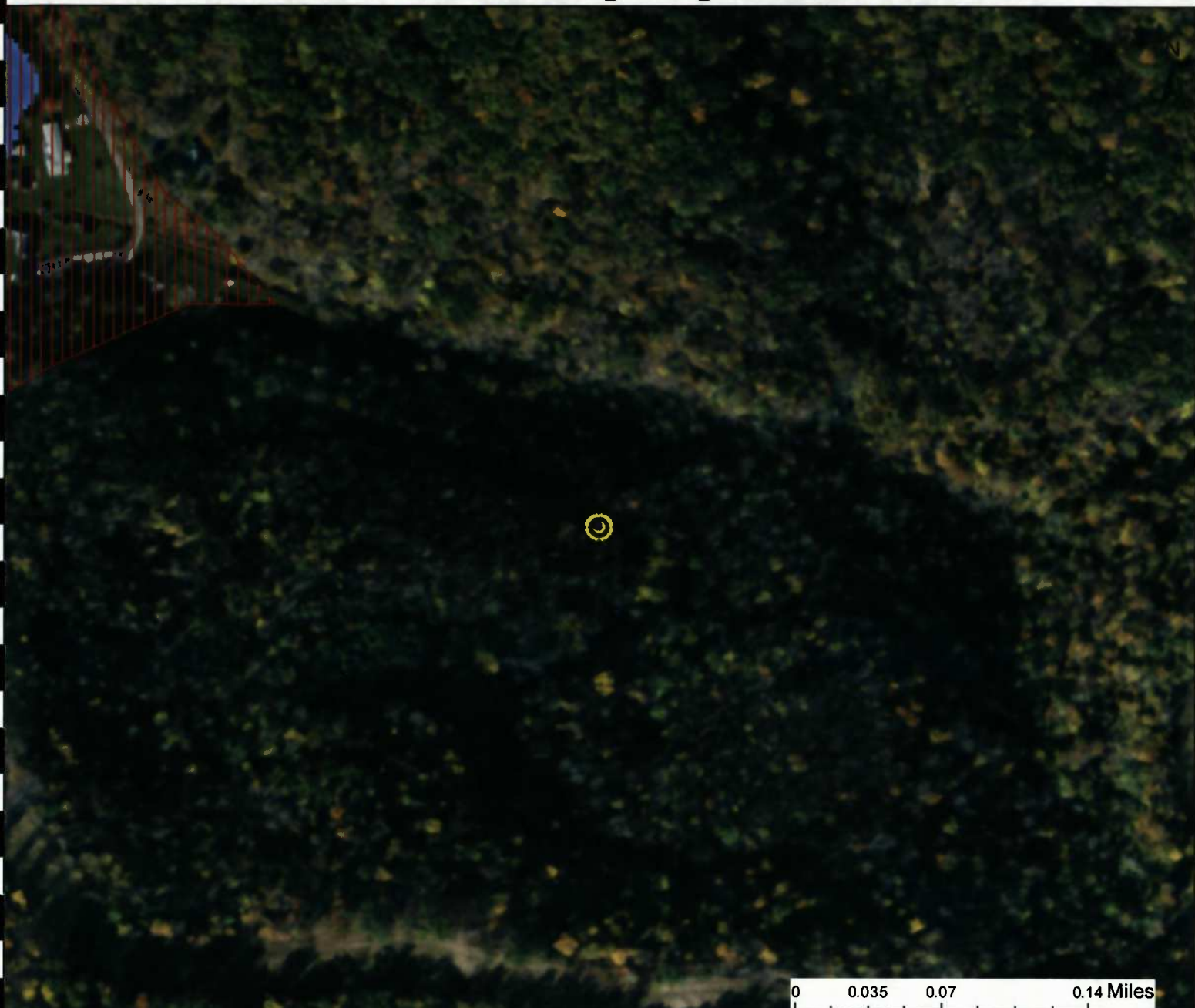
PREPARED FOR:
EQM GATHERING OPCO, LLC
625 LIBERTY AVENUE
PITTSBURGH, PENNSYLVANIA, 15222

Date	No	REVISION RECORD
-	01	-
-	02	-
-	03	-
-	04	-
-	05	-
-	06	-
-	07	-
-	08	-



GATEWAY[®]
The Gateway Engineers, Inc.
Full-Service Civil Engineering & Surveying
Pittsburgh, PA
gatewayengineers.com 855-634-9284







WV Flood Map Impact 33




0 0.035 0.07 0.14 Miles

This map is not the official regulatory FIRM or DFIRM. Its purpose is to assist with determining potential flood risk for the selected location.

Map created on January 8, 2016

-  Cross Section (XS) Lines
-  Base Flood Elevation (BFE) Lines
-  Floodway
- Flood Hazard Zone**
-  Approximate Study (Zone A)
-  Detailed Study (AE, AH, AO)
-  Community Rating System Areas

 Location of flood information
User Notes:
 Impact 33

Disclaimer:
 The online map is for use in administering the National Flood Insurance Program. It does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size. To obtain more detailed information in areas where Base Flood Elevations have been determined, users are encouraged to consult the latest Flood Profile data contained in the official flood insurance study. These studies are available online at www.msc.fema.gov.
 WV Flood Tool (<http://www.MapWV.gov/flood>) is supported by FEMA, WV NFIP Office, and WV GIS Technical Center.

Flood Hazard Area:
 Flood Hazard Area: Location is NOT WITHIN any identified flood hazard area. Unmapped flood hazard

Flood Hazard Zone: N/A
Stream: N/A
FEMA Issued Flood Map: 54017C0120C
Watershed (HUC8): Little Musringum-Middle Island (503600020001000)
Advisory Flood Height: N/A
Water Depth: N/A
Elevation: About 952 ft
Location (long, lat): (80.805384 W, 39.253195 N)
Location (UTM 17N): (516792, 4344892)
Contacts: Doddridge
CRS Information: N/A
Flood Profile: N/A
HEC-RAS Model: N/A
Parcel Number:

APPENDIX N
STREAM IMPACT TABLES

Table 1.1

Impacted Regulated Streams within the Project Area

Notes:

Description	Designation ¹	Waterbody	Stream Type	Stream Classification ²	Approx. Station	Crossing Location	County	Nearest Intersection	Crossing Method	Top of Bank Width (feet)	Crossing Length (feet)	Fill Material (cu. ft)	Crossing Area (sq. ft)	Stream Dimensions ³			
														Channel Width (feet)	Channel Depth (feet)	Water Width (feet)	Water Depth (Inches)
Crossing #1	Stream AA	UNT to South Fork Hughes River Creek	Intermittent	N/A	2+33	Lat 39°11'24.81" Lon -80°47'41.79"	Doddridge	CR 19/11 & Hughes River Rd.	Open Cut/ Span Mat	2-4	63	73	252	1-3	1-3	1-3	0.08-0.16
Crossing #2	Stream BB	South Fork Hughes River	Perennial	WWF	3+73	Lat 39°11'24.68" Lon -80°47'43.39"	Doddridge	CR 23/3 & Haystack Ln.	Conventional Bore/ Span Mat	10-20	N/A	N/A	N/A	8-15	1-3	6-12	.25-1
Crossing #3	Stream CC	UNT to South Fork Hughes River	Intermittent	N/A	9+75	Lat 39°11'24.28" Lon -80°47'50.75"	Doddridge	CR 19/11 & Hughes River Rd.	Open Cut/ Span Mat	10-20	37	367	740	8-15	1-3	6-12	.25-1
Crossing #4	Stream BB	South Fork Hughes River Creek	Perennial	WWF	15+00	Lat 39°11'27.04" Lon -80°47'55.59"	Doddridge	CR 19/11 & Hughes River Rd.	Conventional Bore/ Span Mat	3-6	N/A	N/A	N/A	2-5	1-2	DRY	DRY
Crossing #5	Stream DD	UNT to South Fork Hughes River	Ephemeral	N/A	20+25	Lat 39°11'31.60" Lon -80°47'58.68"	Doddridge	CR 19/11 & Hughes River Rd.	Open Cut/ Span Mat	10-20	63	367	1260	8-15	1-3	6-12	.25-1
Crossing #6	Stream EE	UNT to South Fork Hughes River	Intermittent	WWF	23+73	Lat 39°11'33.81" Lon -80°48'01.58"	Doddridge	CR 19/11 & Hughes River Rd.	Open Cut/ Span Mat	2-4	25	73	100	1-3	1-3	1-3	0.08-0.25
Crossing #7	Stream BB	South Fork Hughes River	Perennial	WWF	29+00	Lat 39°11'36.15" Lon -80°48'07.66"	Doddridge	CR 19/11 & Hughes River Rd.	Conventional Bore/ Span Mat	10-20	N/A	N/A	N/A	8-15	1-3	6-12	.25-1
Crossing #8	Stream BB	South Fork Hughes River	Perennial	WWF	36+30	Lat 39°11'40.18" Lon -80°48'14.93"	Doddridge	CR 19/11 & Hughes River Rd.	Conventional Bore/ Span Mat	10-20	N/A	N/A	N/A	8-15	1-3	6-12	.25-1
Crossing #9	Stream BB	South Fork Hughes River	Perennial	WWF	37+90	Lat 39°11'41.07" Lon -80°48'16.62"	Doddridge	CR 19/11 & Hughes River Rd.	Conventional Bore/ Span Mat	10-20	N/A	N/A	N/A	8-15	1-3	6-12	.25-1
Crossing #10	Stream BB	South Fork Hughes River	Perennial	WWF	41+50	Lat 39°11'42.76" Lon -80°48'20.50"	Doddridge	CR 19/11 & Hughes River Rd.	Conventional Bore/ Span Mat	10-20	N/A	N/A	N/A	8-15	1-3	6-12	.25-1
Total USACE Impacts											188	880	2,352 (0.05 AC)				

1. This preliminary determination of jurisdictional status is based on the Corps/EPA JDI Guidebook instruction.
 2. WWF – Warm Water Fishery, as classified by WV Requirements Governing Water Quality Standards Rule – Title 47CR52.
 3. All dimensions in the table are approximate.

Table 1.2
Impacted Unregulated Streams within the Project Area

Notes:

Description	Designation ¹	Waterbody	Stream Type	Stream Classification ²	Approx. Station	Crossing Location	County	Nearest Intersection	Crossing Method	Top of Bank Width (feet)	Crossing Length (feet)	Fill Material (cu. ft)	Crossing Area (sq. ft)	Stream Dimensions ³			
														Channel Width (feet)	Channel Depth (feet)	Water Width (feet)	Water Depth (inches)
Crossing #11	Stream GG	UNT to South Fork Hughes River	Intermittent	N/A	59+75	Lat 39°11'57.45" Lon -80°48'22.20"	Doddridge	CR 23/2 & Waco Rd	Open Cut/ Span Mat	2-5	51	92	255	1-4	1-4	DRY	DRY
Crossing #12	Stream LL	UNT to Left Fork Arnold Creek	Perennial	N/A	164+50	Lat 39°13'11.80" Lon -80°47'46.33"	Doddridge	Punkin Center Rd	Open Cut/ Span Mat	6-12	54	220	648	2-4	1-2	1-4	0.08-0.33
Crossing #13	Stream N	UNT to Left Fork Arnold Creek	Intermittent/ Perennial	N/A	186+10	Lat 39°13'30.32" Lon -80°47'49.08"	Doddridge	Punkin Center Rd	Open Cut/ Span Mat	4	64	73	256	3	2	1-1.5	0.08-0.25
Crossing #14	Stream S	UNT to Left Fork Arnold Creek	Ephemeral	N/A	224+30	Lat 39°13'53.76" Lon -80°47'59.96"	Doddridge	N/A	Open Cut/ Span Mat	2-5	93	92	465	1-3	0.5-2	DRY	DRY
Crossing #15	Stream Q	UNT to Left Fork Arnold Creek	Perennial	N/A	224+50	Lat 39°13'53.90" Lon -80°47'59.97"	Doddridge	N/A	Open Cut/ Span Mat	5-10	35	183	350	3-6	1-2	0-1	0-0.08
Crossing #16	Stream 10	UNT to Left Fork Arnold Creek	Perennial	N/A	240+75	Lat 39°14'02.87" Lon -80°47'44.77"	Doddridge	N/A	Open Cut/ Span Mat	15-25	51	458	1275	4-8	2-5	1.5-2	0-0.08
Crossing #17	Stream 4	UNT to Left Fork Arnold Creek	Perennial	WWF	262+60	Lat 39°14'22.70" Lon -80°47'47.64"	Doddridge	CR 11/4 & Turkey Lick Run	Open Cut/ Span Mat	20-25	52	458	1300	4-12	1-4	1-2	0.08
Crossing #18	Stream C	UNT to Right Fork Arnold Creek	Perennial	N/A	303+75	Lat 39°14'52.63" Lon -80°48'16.01"	Doddridge	CR 11	Open Cut/ Span Mat	6-8	53	147	424	3-4	1-2.5	1.5-2	0.08-0.20
Crossing #19	Stream A	UNT to Right Fork Arnold Creek	Perennial	N/A	325+00	Lat 39°15'13.11" Lon -80°48'14.39"	Doddridge	N/A	Open Cut/ Span Mat	3-5	52	92	260	1-2	1-2	0.5-1	0.08-0.16
Crossing #20	Stream NN	UNT Big Run	Intermittent	N/A	Access Road 3	Lat 39°12'31.53" Lon -80°47'26.94"	Doddridge	N/A	Existing Culvert/ Span Mat	2-4	59	73	236	1-2	1	1-2	0.08-0.33
Crossing #21	Stream MM	UNT Big Run	Ephemeral	N/A	Access Road 3	Lat 39°12'33.89" Lon -80°47'24.81"	Doddridge	N/A	Existing Ford/ Span Mat	2-5	45	92	225	1-4	1-3	DRY	DRY

1. This preliminary determination of jurisdictional status is based on the Corps/EPA JDI Guidebook instruction.
 2. WWF – Warm Water Fishery, as classified by WV Requirements Governing Water Quality Standards Rule – Title 47CRS2.
 3. All dimensions in the table are approximate.

Table 1.2
Impacted Unregulated Streams within the Project Area

Description	Designation ¹	Waterbody	Stream Type	Stream Classification ²	Approx. Station	Crossing Location	County	Nearest Intersection	Crossing Method	Top of Bank Width (feet)	Crossing Length (feet)	Fill Material (cu. ft)	Crossing Area (sq. ft)	Stream Dimensions ³			
														Channel Width (feet)	Channel Depth (feet)	Water Width (feet)	Water Depth (inches)
Crossing #22	Stream MM	UNT Big Run	Ephemeral	N/A	Access Road 3	Lat 39°12'35.57" Lon -80°47'22.69"	Doddridge	N/A	Existing Culvert/ Span Mat	2-5	42	92	210	1-4	1-3	DRY	DRY
Crossing #23	Stream T	Left Fork Arnold Creek	Perennial	N/A	Access Road 5	Lat 39°13'19.45" Lon -80°47'43.00"	Doddridge	N/A	Existing Culvert/ Span Mat	3-10	25	183	250	2-6	1-3	1-5	0.08-0.33
Crossing #24	Stream T	Left Fork Arnold Creek	Perennial	N/A	Access Road 5	Lat 39°13'26.87" Lon -80°47'46.61"	Doddridge	N/A	Existing Culvert/ Span Mat	3-10	25	183	250	2-6	1-3	1-5	0.08-0.33
Crossing #25	Stream N	UNT to Left Fork Arnold Creek	Intermittent/ Perennial	N/A	Access Road 6	Lat 39°13'29.38 Lon -80°47'58.36"	Doddridge	Punkin Center Rd	Existing Ford/ Span Mat	4	60	73	240	3	2	1-1.5	0.08-0.25
Crossing #26	Stream N	UNT to Left Fork Arnold Creek	Intermittent/ Perennial	N/A	Access Road 6	Lat 39°13'29.27" Lon -80°48'06.99"	Doddridge	Punkin Center Rd	Existing Ford/ Span Mat	4	41	73	164	3	2	1-1.5	0.08-0.25
Crossing #27	Stream N	UNT to Left Fork Arnold Creek	Intermittent/ Perennial	N/A	Access Road 6	Lat 39°13'30.97" Lon -80°48'12.14"	Doddridge	Punkin Center Rd	Existing Ford/ Span Mat	4	101	73	404	3	2	1-1.5	0.08-0.25
Crossing #28	Stream 18	UNT to Left Fork Arnold Creek	Ephemeral	N/A	Access Road 7	Lat 39°14'20.74" Lon -80°47'35.69"	Doddridge	CR 11/4 & Turkey Lick Run	Existing Ford/ Span Mat	3	25	55	75	1-3	1-3	DRY	DRY
Crossing #29	Stream 7	UNT to Left Fork Arnold Creek	Ephemeral	N/A	Access Road 7	Lat 39°14'19.21" Lon -80°47'44.35"	Doddridge	CR 11/4 & Turkey Lick Run	Existing Culvert/ Span Mat	3-5	27	92	135	1-1.5	1-4	DRY	DRY
Crossing #30	Stream C	UNT to Right Fork Arnold Creek	Perennial	N/A	Access Road 9	Lat 39°14'50.98" Lon -80°48'28.52"	Doddridge	CR 11	Existing Culvert/ Span Mat	6-8	50	147	400	3-4	1-2.5	1.5-2	0.08-0.2
Crossing #31	Stream E	UNT to Right Fork Arnold Creek	Intermittent	N/A	Access Road 9	Lat 39°14'52.52" Lon -80°48'21.56"	Doddridge	CR 11	Existing Culvert/ Span Mat	3-5	26	92	130	1-1.5	0.5-2	0.5-1	0-0.08
Crossing #32	Stream K	UNT to Right Fork Arnold Creek	Ephemeral	N/A	Access Road 10	Lat 39°15'09.83" Lon -80°48'18.86"	Doddridge	CR 11	Existing Ford/ Span Mat	1-6	24	110	144	0.5-3	0.5-5	DRY	DRY
Crossing #33	Stream J	UNT to Right Fork Arnold Creek	Ephemeral	N/A	Access Road 10	Lat 39°15'11.50" Lon -80°48'19.38"	Doddridge	CR 11	Existing Ford/ Span Mat	1.5-6	33	110	198	1-2	0.5-4	DRY	DRY
Total USACE Impacts											1,088	3,263	8,294 (0.19 ac)				

Notes:
 1. This preliminary determination of jurisdictional status is based on the Corps/EPA IDI Guidebook instruction.
 2. WWF – Warm Water Fishery, as classified by WV Requirements Governing Water Quality Standards Rule – Title 47CR52.
 3. All dimensions in the table are approximate.