

**OHIO DEPARTMENT OF TRANSPORTATION**

CENTRAL OFFICE • 1980 WEST BROAD STREET • COLUMBUS, OH 43223

JOHN R. KASICH, GOVERNOR • JERRY WRAY, DIRECTOR

May 2, 2014

Department of the Army  
Huntington District, Corps of Engineers  
502 Eighth Street  
Huntington, West Virginia 25701-2070  
Attn: Ginger Mullins, Chief

Re: LRH-2014-334-SCR-Salt Creek Notice of Violation

Dear Ms. Mullins:

The Ohio Department of Transportation (ODOT) is providing the attached restoration plan in response to the April 17<sup>th</sup>, 2014 letter of Notice of Violation from your office. The restoration plan developed by ODOT provides three possible options for removal of fill material placed into Salt Creek without a Department of the Army permit. Following your review of this document, we would like the opportunity to discuss with you the next step in the process of remediating this violation.

If you have any questions or comments regarding this plan, please contact Matt Perlik, at (614) 466-1937.

Respectfully,

A handwritten signature in black ink that reads "Timothy M. Nill".

Timothy M. Nill, Administrator  
Office of Environmental Services

TMH:mkp

Electronic Copies: Vaughn Wilson D-9, Troy Huff D-9, Jennifer Townley ODOT-CO, Wendy Melgin USEPA, Peter Clingan USACE, Rachel Taulbee OEPA, Brian Mitch ODNR, OES – File

## SALT CREEK STREAM RESTORATION PLAN

Vinton County, Ohio

Harrison Township

Vinton SR 327

7.44 to 7.80 mile marker

Corp of Engineers Case No: LRH-2014-334-SCR-Salt Creek



Prepared by:  
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May 2, 2014

## TABLE OF CONTENTS

Executive Summary .....	1
Dump Site Map .....	2
1.0 Project Site Location .....	3
1.1 Directions to Project Site .....	3
1.2 USGS HUC Designation .....	3
1.3 Project Vicinity Map .....	3
2.0 Watershed Characterization .....	4
2.1 Drainage Area .....	4
2.2 Stream Characteristics.....	4
2.3 Historical Land Use and Development Trends .....	4
2.4 Protected Species .....	4-5
2.5 FEMA Floodplain FIRM .....	6
3.0 Site Restoration.....	7-8
3.1 Restoration Plan .....	8
3.2 Potential Constraints .....	8
3.2.1 Property Ownership .....	8
3.2.2 Site Access .....	8
3.2.3 Stream Restrictions .....	8
3.2.4 Utilities .....	8
4.0 Site Pictures .....	9-12
5.0 Right of Way and Property Maps .....	13-14
6.0 Aerial View of Work Site .....	15

## EXECUTIVE SUMMARY

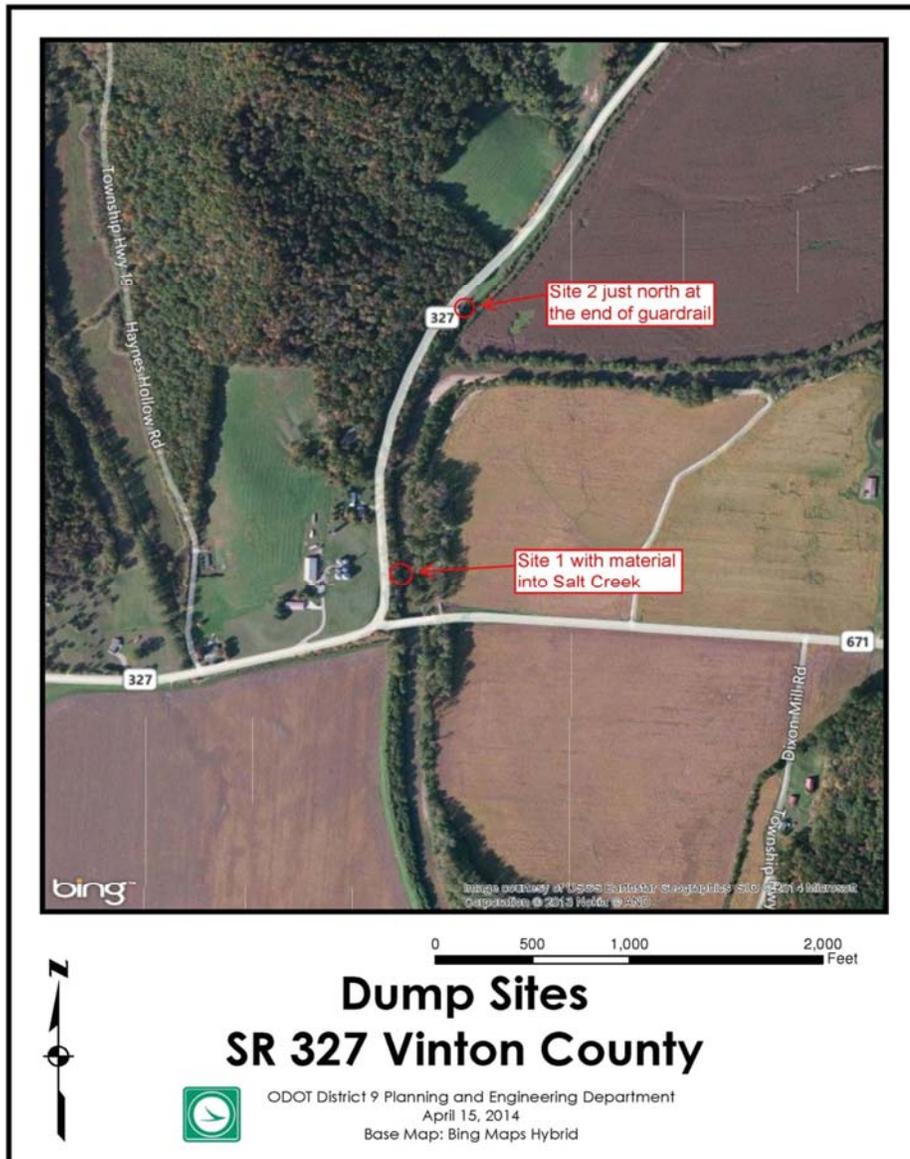
On April 7, 8, 9, and 10, 2014, crews from the Ohio Department of Transportation, District 9 Ross County maintenance garage were performing ditch cleaning operations along state route 327 and United States route 50 in Ross County, Ohio. Both locations were in relative proximity to the Village of Londonderry and the Ross/Vinton County line. The crew elected to dispose of the ditch spoils over and along guardrail at two locations that are located along state route 327 just inside the Vinton County line. Vinton County is part of ODOT, District 10. This activity is a practice used to dispose of ditch spoils as long as it is in an upland area. The spoils can then be levelled and used to widen out the embankment behind guardrail and along the roadway shoulder.

On April 9, 2014, a Transportation Manager assigned to the Vinton County ODOT garage happened to be passing by the above location in the a.m. where Ross County crews were dumping ditching spoils. The manager became alerted to the spoils being dumped into Salt Creek and immediately located the ditching crew leader and asked them to stop dumping in Vinton County and salt creek. The transportation manager proceeded to contact District 10 Environmental Coordinator, Tony Durm. Tony then contacted D-9 Environmental Coordinator, Greg Manson. Greg then made appropriate notification within ODOT of discharge of ditch material without proper authorization into waters of the United States.

On April 15, 2014, Matt Perlik from ODOT, Office of Environmental Services, coordinated with Peter Clingan at the USACE ORTO in Columbus Ohio of the illegal discharge. Peter Clingan then notified USACE Huntington, West Virginia Headquarters. On April 17, 2014, Ginger Mullins, Chief of the Regulatory Division of the Corps of Engineers, issued a Notice of Violation to the department and asked for a restoration plan.

Discharge site #1 is located in Vinton County along state Route 327 at the 7.45 mile marker. Approximately 15 to 20 dump truck loads of ditch spoils were discharged into Salt Creek at one location. Assuming 5 yards per truck, the estimate is 100 cubic yards discharged. Water imprint area is approximately 30 feet into stream and 40'-50' wide.

A second area of dumping was identified but no materials were placed in Waters of the US. Discharge site is located in Vinton County along state Route 327 at the 7.76 mile marker. Approximately 5-6 dump truck loads of loads of ditch spoils were dumped along stream bank of Pike Run, a tributary of Salt Creek. Assuming 5 cubic yards per truck, the estimate is 30 cubic yards disposed. None of the fill material reached the stream but the area will be stabilized.



## 1.0 PROJECT SITE LOCATION

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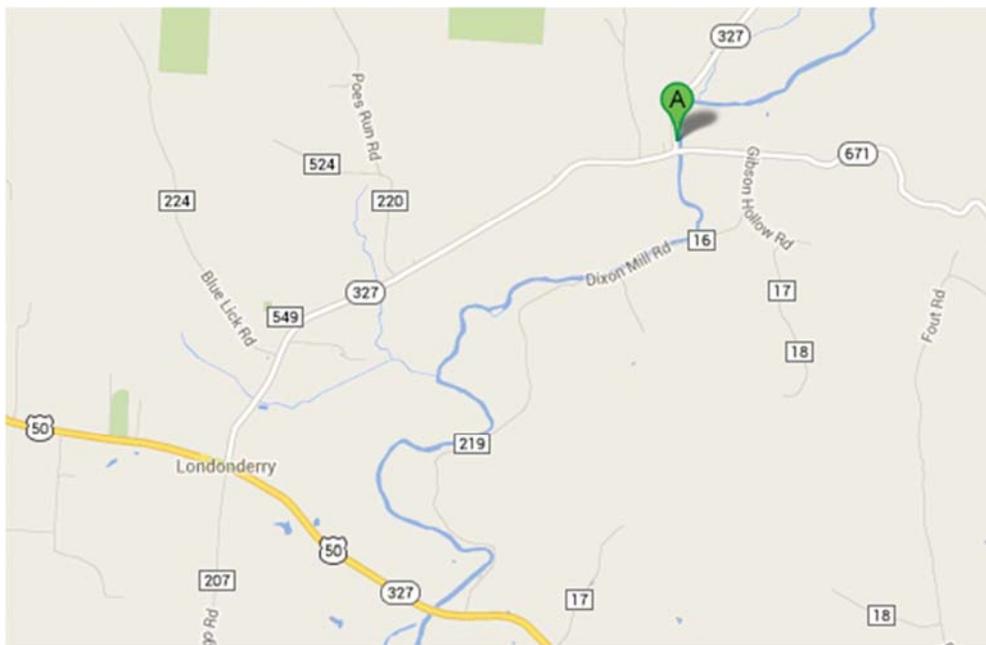
### 1.1 Directions to Site

Site is located approximately 3 miles northeast of Village of Londonderry, Ohio and lies in southwest Vinton County. Take United States Route 50 from Chillicothe, Ohio for approximately 12 miles to Londonderry, Ohio. Turn left onto state Route 327 in Londonderry and travel approximately 3 miles. The site is located on the right side of the road approximately 250 feet north of the state Route 327 and state Route 671 intersection. Latitude 39°17'29", Longitude 82°44'45".

### 1.2 USGS HUC DESIGNATION

This site is located within the United States Geological Survey (USGS) "Ratcliffburg" and 15-digit Hydrologic Unit Code 39082-C6-TF-024. Salt Creek is a direct tributary to the Scioto River, a traditional navigable water of the United States. Thus, Salt Creek by definition becomes regulated water as well. Salt Creek flows in a south to south-western direction. According to ODOT Office of Environmental Services, this site is not a wetland area.

### 1.3 PROJECT VICINITY MAP



## 2.0 WATERSHED CHARACTERIZATION

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### 2.1 DRAINAGE AREA

Site is located on Salt Creek with a watershed of approximately 171,519 acres (268 square miles) in size utilizing Ohio StreamStat to calculate.

### 2.2 STREAM CHARACTERISTICS

Salt Creek is an Exceptional Warm Water Habitat with a drainage area of 268 square miles at the site.

### 2.3 HISTORICAL LAND USE AND DEVELOPMENT TRENDS

The watershed is a mixture of forested lands, agricultural row crops, two-lane roadways, farm roads, and sporadic single family homes. The area adjacent to site is mostly agricultural with some localized forested areas. No zoning exist in this part of Vinton County and little development is expected.

### 2.4 PROTECTED SPECIES

Visual survey of the site found the following potential species classified as protected and subject to review by the United States Fish and Wildlife Service:

#### **Federal**

- Indiana Bat (*Myotis sodalis*)
- Eastern Hellbender (*Cryptobranchus alleganiensis*)
- Northern Long-eared Bat (*Myotis septentrionalis*)
- Running buffalo Clover (*Trifolium stoloniferum*)
- American Burying Beetle (*Nicrophorus Americanus*) species of concern
- Timber Rattlesnake (*Crotalus horridus*) species of concern
- Bald Eagle (*Haliaeetus leucocephalus*) species of concern

**State**

Fragile Papershell mussel (*Lepedea fragilis*)

FatMucket mussel (*Lampsilis radiata luteola*)

Plain Pocketbook mussel (*Lampsilis cardium*)

Cylindrical Papershell mussel (*Anodontoidea ferussaciana*)

Wabash Pigtoe mussel (*Fusconaia flava*)

Pink Heelsplitter mussel (*Potamilus alatus*)

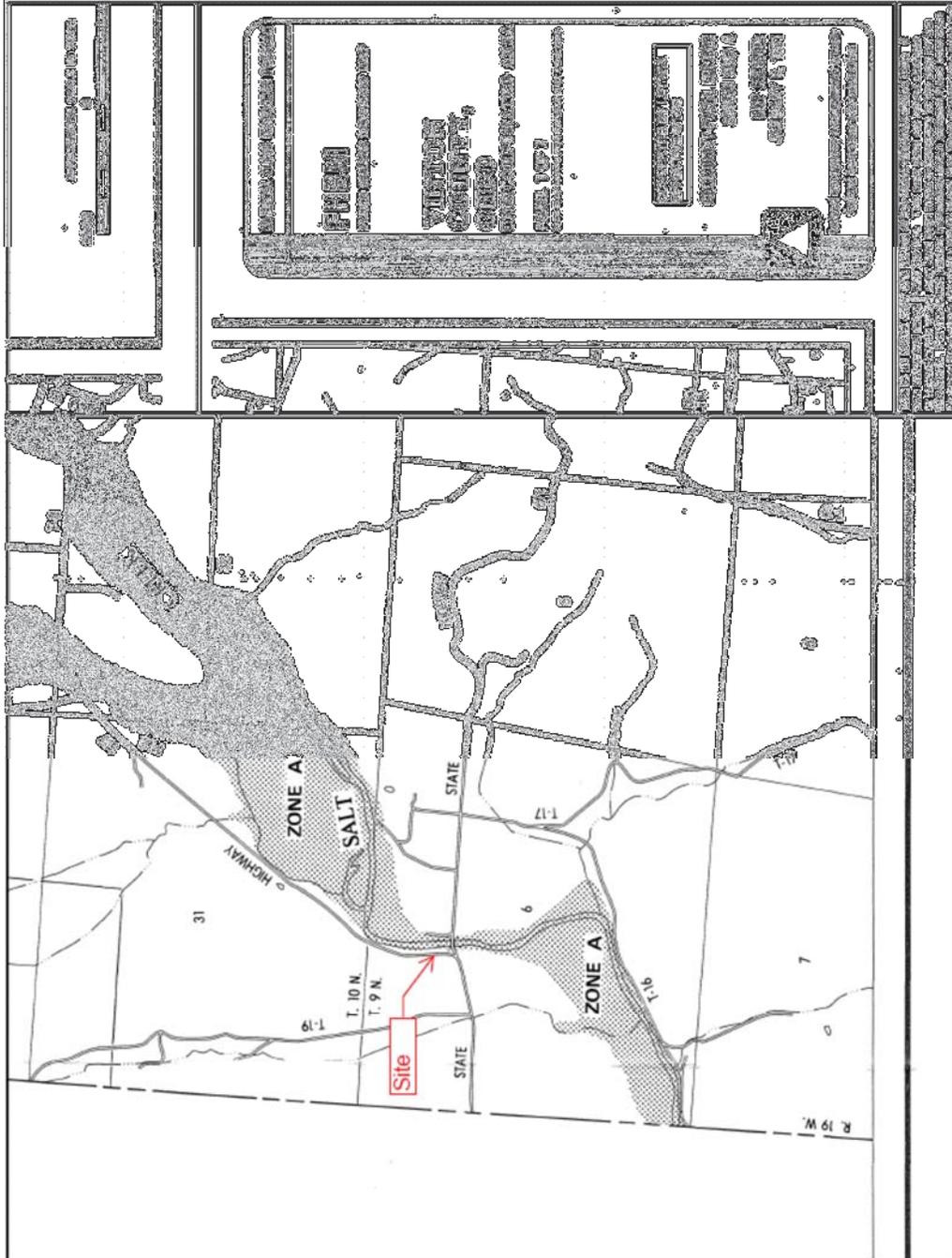
Mud Salamander (*Pseudotriton montanus*)

Black Kingsnake (*Lampropeltis Getula Nigra*)

Eastern Sand Darter (*Ammocrypta pellucida*)

A mussel survey may be needed preformed before any excavating would occur.

## 2.5 FEMA MAP



## 3.0 SITE RESTORATION

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### 3.1 RESTORATION PLAN

Approximately 15 to 20 dump truck loads of ditch spoils were discharged into Salt Creek at one location. Assuming 5 yards per truck, the estimate is 100 cubic yards discharged. Water imprint area is approximately 30 feet into stream and 40'-50' wide. All material discharged into Salt Creek must be removed. The discharge area is located within the floodplain and below the ordinary high water mark. The area is not in a wetland. Disturbed area should be less than one acre.

There are several challenges to overcome due to the topography of the site and the methods of restoration we propose are not something we do on a daily basis.

Proposed methods of restoration:

- 1.) Hydraulic Dredging - utilize a hydraulic pump and hose to remove fill. This could be accomplished by placing a hydraulic pump on the opposite stream bank from the fill. Float suction lines across the stream and suck the material over to the opposite stream bank and place in trucks or dumpsters lined with plastic. This material can then be moved to an upland area to be dewatered and then leveled and seeded and strawed. This method would create the least disturbance to the stream and capture almost 100% to the fill. This method is not a process we have used in District 9 and is investigating this technique.
- 2.) Mechanical Dredging – utilize a large crane with clam bucket placed on opposite stream bank. Crane would reach across the stream and remove the fill. Removed fill would be placed in trucks or dumpsters lined with plastic. The material can then be moved to an upland area to be dewatered and then leveled and seeded and strawed. This method would create more disturbances in the stream than hydraulic dredging and would maybe capture 75% of the fill.
- 3.) Mechanical Dredging – utilize a stone causeway from the opposite stream bank to reach the fill. Use trackhoe to remove fill from causeway. Removed fill would be placed in trucks or dumpsters lined with plastic. The material can then be moved to an upland area to be dewatered and then leveled and seeded and strawed. This method would create the most disturbances in the stream than the above two options and would maybe capture 75% of the fill.

Remediation of the material on the bank slope is questionable due to bank slope, numerous large trees and many rock layers.

Next Step:

Each of the above proposed methods of restoration need to be analyzed for benefit/cost comparisons. We are currently performing research on each technique to identify potential contractors available to perform this work. ODOT would like to discuss these options with the USACE.

## **3.2 POTENTIAL CONSTRAINTS**

### **3.2.1 Property Ownership**

To complete the restoration, the state would need to acquire a right to enter private property agreement with the property owner who owns the land on the opposite stream bank from the discharge site. If the property owner is not cooperative to granting access, then ODOT would need to discuss with USACE alternative options for remediating this violation.

### **3.2.2 Site Access**

The top of the discharge site is easily accessible from SR 327. However, we feel it is neither reasonable nor practical to access the stream from SR 327 because the stream bank is very steep with 40 foot plus drop to water, numerous large trees and many rock layers. Several large trees would need removed. Removing the trees is problematic because they are potential Indiana bat habitat. To access the fill in the stream we must enter private property across the stream from the fill. Accessing the site from SR 671 is problematic due to bridge height, right of way widths, and slope grades.

### **3.2.3 Stream Restrictions**

Salt Creek has in-stream work restrictions from April 15 through June 30. Therefore, restoration work could not begin until July 1 unless a waiver is granted. The waiver would be sought through the USACE/ODNR DOW established waiver process if work needs to begin before July 1.

### **3.2.4 Utilities**

No utilities are known to exist within the project area.

**4.0 SITE – PICTURES**

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Looking West at discharge from opposite steam bank of Salt Creek



Looking West at discharge from opposite steam bank of Salt Creek



#### 4.0 SITE – PICTURES

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Looking North (upstream) of Salt Creek from SR 671 Bridge



Looking north on SR 327 at discharge location



4.0 SITE – PICTURES

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Looking south on SR 327 at discharge location



Standing on SR 327 looking East at discharge location at Salt Creek



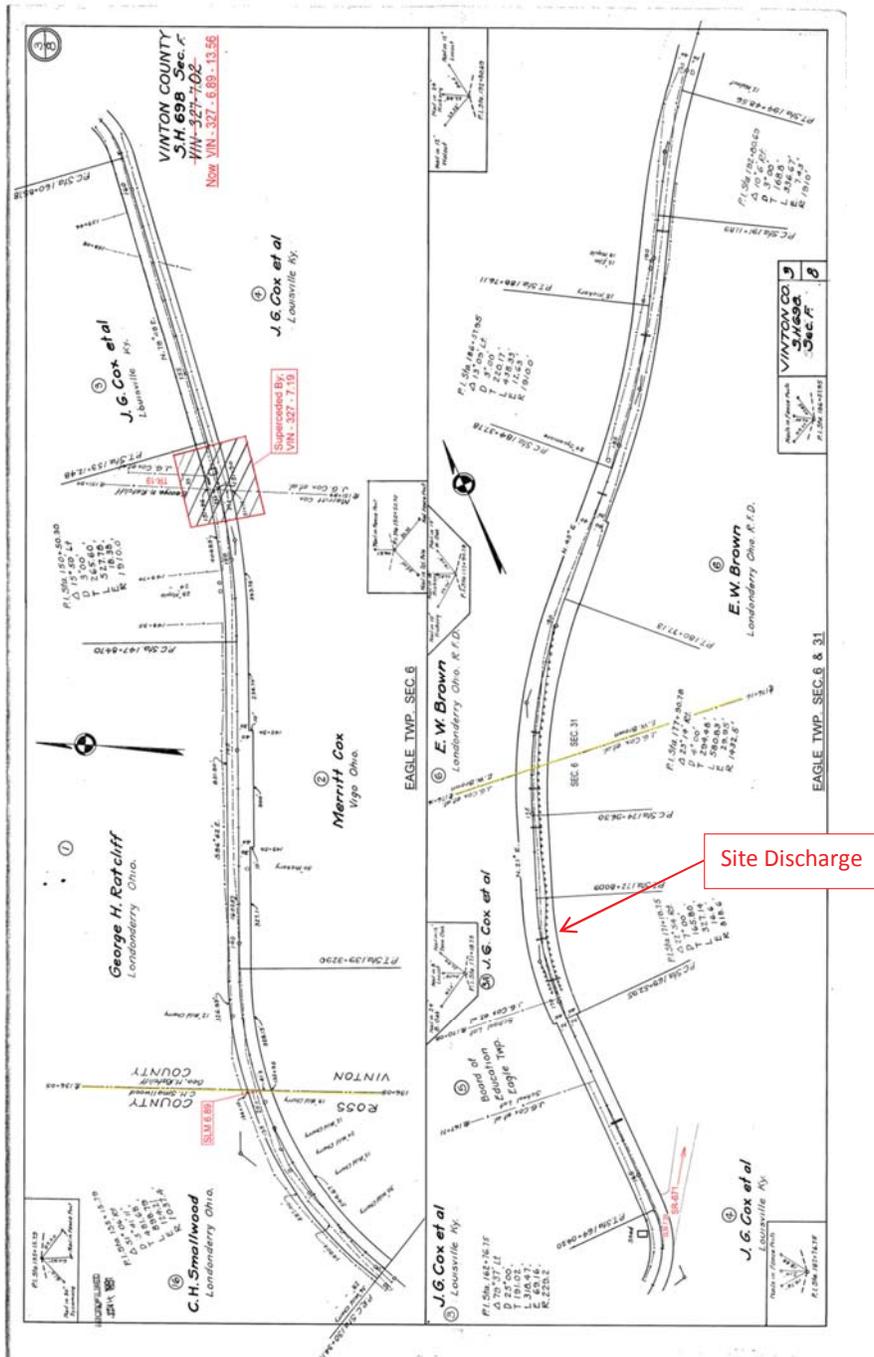
#### 4.0 SITE – PICTURES

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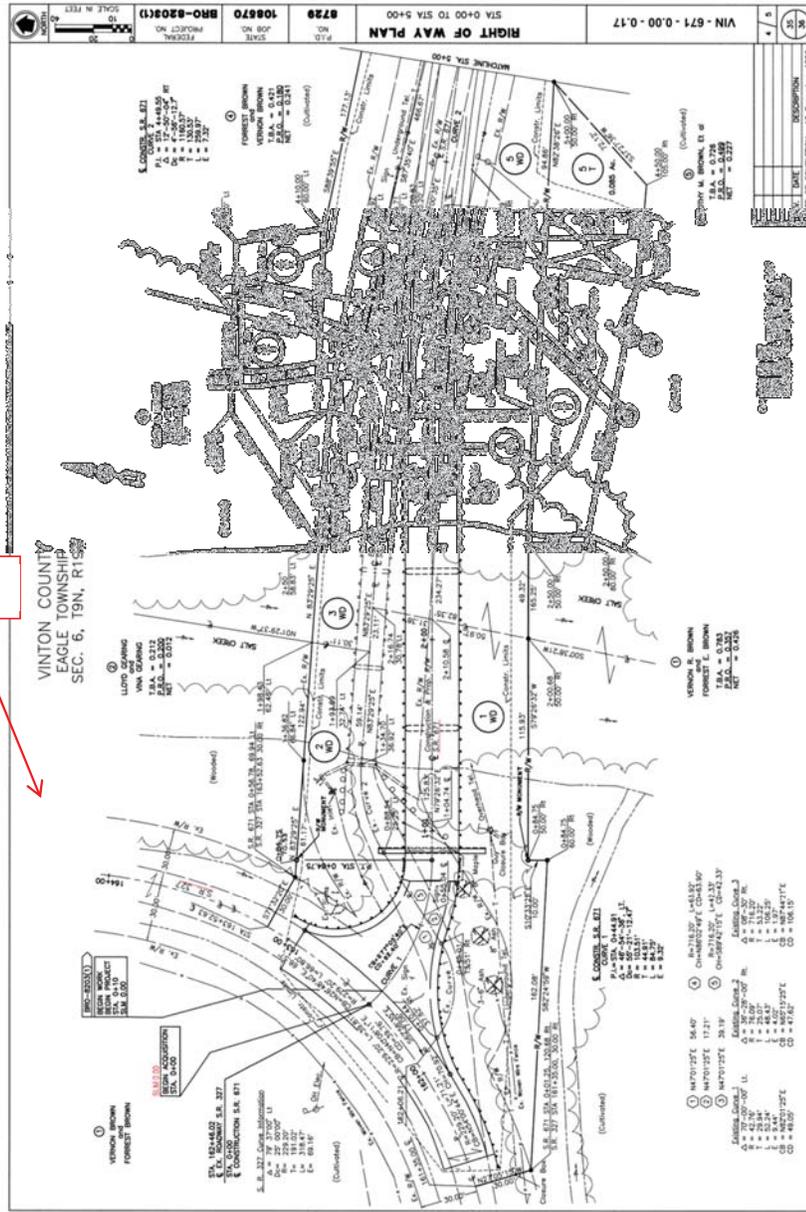
Standing on SR 327 looking East at discharge location at Salt Creek



5.0 RIGHT OF WAY AND PROPERTY MAPS



5.0 RIGHT OF WAY AND PROPERTY MAPS



Site Discharge

### 6.0 AERIAL VIEW OF WORK SITE

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