



STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION

BEVERLY EAVES PERDUE
GOVERNOR

EUGENE A. CONTI, JR.
SECRETARY

May 19, 2009

U. S. Army Corps of Engineers
Regulatory Field Office
3331 Heritage Trade Drive - Suite 105
Wake Forest, NC 27587

ATTN: Mr. Monte Matthews
NCDOT Coordinator

Dear Sir:

Subject: **Application for Section 404 Nationwide Permits 23 and 33** for the proposed replacement of Bridge No. 44 over North Toe River on US 19E in Avery County, Federal Aid Project No. BRSTP-019E(3); Division 11; TIP No. B-3608; WBS 33161.1.1

The North Carolina Department of Transportation (NCDOT) proposes to replace Bridge No. 44 over North Toe River on US 19E. There will be 0.05 acres of temporary surface water impacts from temporary rock pads, <0.01 acres of permanent surface water impacts from an interior bent.

Please see enclosed copies of the Pre-Construction Notification (PCN), permit drawings, design plans and Stormwater Management Plan for the above-referenced project. The Categorical Exclusion (CE) was completed in July 2007 and the Right-of-Way Consultation was completed in October 2008. Documents were distributed shortly thereafter. Additional copies are available upon request.

Comments from the North Carolina Wildlife Resources Commission (NCWRC) will be required prior to authorization by the Corps of Engineers. By copy of this letter and attachment, NCDOT hereby requests NCWRC review. NCDOT request that NCWRC forward their comments to the Corps of Engineers and the NCDOT within 30 calendar days of receipt of this application.

This project calls for a letting date of February 16, 2010 and a review date of December 29, 2009.

A copy of this permit application will be posted on the NCDOT Website at:
<http://www.ncdot.org/doh/preconstruct/pe/>. If you have any questions or need additional information, please call Jennifer Harrod at (919) 431-6672.

Sincerely,



for

Gregory J. Thorpe, Ph.D.
Environmental Management Director, PDEA

w/attachment

Mr. Brian Wrenn, NCDWQ (2 copies)
Ms. Marla Chambers, NCWRC
Ms. Marella Buncick, USFWS

w/o attachment (see permit website for attachments)

Dr. David Chang, P.E., Hydraulics
Mr. Mark Staley, Roadside Environmental
Mr. Victor Barbour, P.E., Project Services Unit
Mr. Greg Perfetti, P.E., Structure Design
Mr. Michael A. Pettyjohn, P.E., Division 11 Engineer
Mr. Heath Slaughter, Division 11 Environmental Officer
Mr. Jay Bennett, P.E., Roadway Design
Mr. Majed Alghandour, P. E., Programming and TIP
Mr. Art McMillan, P.E., Highway Design
Mr. Scott McLendon, USACE, Wilmington
Mr. Vincent Rhea, PDEA



Office Use Only:
Corps action ID no. _____
DWQ project no. _____
Form Version 1.3 Dec 10 2008

Pre-Construction Notification (PCN) Form

A. Applicant Information

1. Processing

1a. Type(s) of approval sought from the Corps:	<input checked="" type="checkbox"/> Section 404 Permit	<input type="checkbox"/> Section 10 Permit
1b. Specify Nationwide Permit (NWP) number: 23 33	or General Permit (GP) number:	
1c. Has the NWP or GP number been verified by the Corps?	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
1d. Type(s) of approval sought from the DWQ (check all that apply):		
<input type="checkbox"/> 401 Water Quality Certification – Regular	<input type="checkbox"/> Non-404 Jurisdictional General Permit	
<input type="checkbox"/> 401 Water Quality Certification – Express	<input type="checkbox"/> Riparian Buffer Authorization	
1e. Is this notification solely for the record because written approval is not required?	For the record only for DWQ 401 Certification: <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	For the record only for Corps Permit: <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
1f. Is payment into a mitigation bank or in-lieu fee program proposed for mitigation of impacts? If so, attach the acceptance letter from mitigation bank or in-lieu fee program.	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
1g. Is the project located in any of NC's twenty coastal counties. If yes, answer 1h below.	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
1h. Is the project located within a NC DCM Area of Environmental Concern (AEC)?	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No

2. Project Information

2a. Name of project:	Replacment of Bridge No. 44 over North Toe River on US 19 East
2b. County:	Avery
2c. Nearest municipality / town:	Plumtree
2d. Subdivision name:	<i>not applicable</i>
2e. NCDOT only, T.I.P. or state project no:	B-3608

3. Owner Information

3a. Name(s) on Recorded Deed:	North Carolina Department of Transportation
3b. Deed Book and Page No.	<i>not applicable</i>
3c. Responsible Party (for LLC if applicable):	<i>not applicable</i>
3d. Street address:	1598 Mail Service Center
3e. City, state, zip:	Raleigh, NC 27699-1598
3f. Telephone no.:	(919) 431-6672
3g. Fax no.:	(919) 431-2002
3h. Email address:	jwharrod@ncdot.gov

4. Applicant Information (if different from owner)	
4a. Applicant is:	<input type="checkbox"/> Agent <input type="checkbox"/> Other, specify:
4b. Name:	<i>not applicable</i>
4c. Business name (if applicable):	
4d. Street address:	
4e. City, state, zip:	
4f. Telephone no.:	
4g. Fax no.:	
4h. Email address:	
5. Agent/Consultant Information (if applicable)	
5a. Name:	<i>not applicable</i>
5b. Business name (if applicable):	
5c. Street address:	
5d. City, state, zip:	
5e. Telephone no.:	
5f. Fax no.:	
5g. Email address:	

B. Project Information and Prior Project History	
1. Property Identification	
1a. Property identification no. (tax PIN or parcel ID):	<i>not applicable</i>
1b. Site coordinates (in decimal degrees):	Latitude: 36.3 (DD.DDDDDD) Longitude: - 82.0 (-DD.DDDDDD)
1c. Property size:	834.72' L x 326.79 W' = 272,778.15 ft sq. (272,778.15) / (43,650) = 6.25 acres
2. Surface Waters	
2a. Name of nearest body of water (stream, river, etc.) to proposed project:	North Toe River
2b. Water Quality Classification of nearest receiving water:	WS-V; Tr
2c. River basin:	French Broad
3. Project Description	
3a. Describe the existing conditions on the site and the general land use in the vicinity of the project at the time of this application:	25% White Pine Forest, 25% Montane Alluvial Forest, 50% Urban/Disturbed --- medium density Detached dwellings
3b. List the total estimated acreage of all existing wetlands on the property:	No wetlands / Not applicable
3c. List the total estimated linear feet of all existing streams (intermittent and perennial) on the property:	145.5' (perennial)
3d. Explain the purpose of the proposed project:	To replace a structurally deficient and functionally obsolete bridge.
3e. Describe the overall project in detail, including the type of equipment to be used:	The project involves replacing a 126-foot bridge with a 120-foot, 2-span cored slab bridge just northwest of existing location. An off-site detour will be utilized to maintain traffic. Standard road building equipment, such as trucks, dozers, and cranes will be used.
4. Jurisdictional Determinations	
4a. Have jurisdictional wetland or stream determinations by the Corps or State been requested or obtained for this property / project (including all prior phases) in the past? Comments:	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Unknown
4b. If the Corps made the jurisdictional determination, what type of determination was made?	<input type="checkbox"/> Preliminary <input checked="" type="checkbox"/> Final
4c. If yes, who delineated the jurisdictional areas? Name (if known): John Thomas	Agency/Consultant Company: MA Engineering Other: staff member: Michael Eagon
4d. If yes, list the dates of the Corps jurisdictional determinations or State determinations and attach documentation.	January 5, 2004
5. Project History	
5a. Have permits or certifications been requested or obtained for this project (including all prior phases) in the past?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> Unknown
5b. If yes, explain in detail according to "help file" instructions.	

6. Future Project Plans

6a. Is this a phased project?

Yes

No

6b. If yes, explain.

C. Proposed Impacts Inventory

1. Impacts Summary

1a. Which sections were completed below for your project (check all that apply):

- Wetlands Streams - tributaries Buffers
 Open Waters Pond Construction

2. Wetland Impacts

If there are wetland impacts proposed on the site, then complete this question for each wetland area impacted.

2a. Wetland impact number – Permanent (P) or Temporary (T)	2b. Type of impact	2c. Type of wetland (if known)	2d. Forested	2e. Type of jurisdiction (Corps - 404, 10 DWQ – non-404, other)	2f. Area of impact (acres)
Site 1 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Corps <input type="checkbox"/> DWQ	
Site 2 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Corps <input type="checkbox"/> DWQ	
Site 3 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Corps <input type="checkbox"/> DWQ	
Site 4 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Corps <input type="checkbox"/> DWQ	
Site 5 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Corps <input type="checkbox"/> DWQ	
Site 6 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Corps <input type="checkbox"/> DWQ	
2g. Total wetland impacts					X Permanent X Temporary

2h. Comments:

3. Stream Impacts

If there are perennial or intermittent stream impacts (including temporary impacts) proposed on the site, then complete this question for all stream sites impacted.

3a. Stream impact number - Permanent (P) or Temporary (T)	3b. Type of impact	3c. Stream name	3d. Perennial (PER) or intermittent (INT)?	3e. Type of jurisdiction (Corps - 404, 10 DWQ – non-404, other)	3f. Average stream width (feet)	3g. Impact length (linear feet)
Site 1 <input type="checkbox"/> P <input checked="" type="checkbox"/> T	Proposed Bridge Bent Construction	North Toe River	<input checked="" type="checkbox"/> PER <input type="checkbox"/> INT	<input checked="" type="checkbox"/> Corps <input type="checkbox"/> DWQ	50'	0.02 acres
Site 2 <input type="checkbox"/> P <input checked="" type="checkbox"/> T	Partial removal of existing bents	North Toe River	<input checked="" type="checkbox"/> PER <input type="checkbox"/> INT	<input checked="" type="checkbox"/> Corps <input type="checkbox"/> DWQ	50'	0.03 acres
Site 3 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> PER <input type="checkbox"/> INT	<input type="checkbox"/> Corps <input type="checkbox"/> DWQ		
Site 4 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> PER <input type="checkbox"/> INT	<input type="checkbox"/> Corps <input type="checkbox"/> DWQ		
Site 5 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> PER <input type="checkbox"/> INT	<input type="checkbox"/> Corps <input type="checkbox"/> DWQ		
Site 6 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> PER <input type="checkbox"/> INT	<input type="checkbox"/> Corps <input type="checkbox"/> DWQ		
3h. Total stream and tributary impacts						0.05 ac. Temp

3i. Comments:

4. Open Water Impacts

If there are proposed impacts to lakes, ponds, estuaries, tributaries, sounds, the Atlantic Ocean, or any other open water of the U.S. then individually list all open water impacts below.

4a. Open water impact number – Permanent (P) or Temporary (T)	4b. Name of waterbody (if applicable)	4c. Type of impact	4d. Waterbody type	4e. Area of impact (acres)
O1 <input type="checkbox"/> P <input type="checkbox"/> T				
O2 <input type="checkbox"/> P <input type="checkbox"/> T				
O3 <input type="checkbox"/> P <input type="checkbox"/> T				
O4 <input type="checkbox"/> P <input type="checkbox"/> T				
4f. Total open water impacts				X Permanent X Temporary

4g. Comments:

5. Pond or Lake Construction

If pond or lake construction proposed, then complete the chart below.

5a. Pond ID number	5b. Proposed use or purpose of pond	5c. Wetland Impacts (acres)			5d. Stream Impacts (feet)			5e. Upland (acres)
		Flooded	Filled	Excavated	Flooded	Filled	Excavated	Flooded
P1								
P2								
5f. Total								

5g. Comments:

5h. Is a dam high hazard permit required? Yes No If yes, permit ID no:

5i. Expected pond surface area (acres):

5j. Size of pond watershed (acres):

5k. Method of construction:

6. Buffer Impacts (for DWQ)

If project will impact a protected riparian buffer, then complete the chart below. If yes, then individually list all buffer impacts below. If any impacts require mitigation, then you **MUST** fill out Section D of this form.

6a. Project is in which protected basin?		<input type="checkbox"/> Neuse <input type="checkbox"/> Tar-Pamlico <input type="checkbox"/> Other: <input type="checkbox"/> Catawba <input type="checkbox"/> Randleman			
6b. Buffer impact number – Permanent (P) or Temporary (T)	6c. Reason for impact	6d. Stream name	6e. Buffer mitigation required?	6f. Zone 1 impact (square feet)	6g. Zone 2 impact (square feet)
B1 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> Yes <input type="checkbox"/> No		
B2 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> Yes <input type="checkbox"/> No		
B3 <input type="checkbox"/> P <input type="checkbox"/> T			<input type="checkbox"/> Yes <input type="checkbox"/> No		
6h. Total buffer impacts					
6i. Comments:					

D. Impact Justification and Mitigation		
1. Avoidance and Minimization		
1a. Specifically describe measures taken to avoid or minimize the proposed impacts in designing project. No there will be no direct discharge into North Toe River, an off site detour will be used. The NCDOT will adhere to design standards for sensitive watersheds		
1b. Specifically describe measures taken to avoid or minimize the proposed impacts through construction techniques. NCDOT Best Management Practices will be implemented during construction and demolition. The NCDOT will observe a moratorium on in-water work and work in the 25-foot buffer between October 15 – April 15 to protect trout spawning.		
2. Compensatory Mitigation for Impacts to Waters of the U.S. or Waters of the State		
2a. Does the project require Compensatory Mitigation for impacts to Waters of the U.S. or Waters of the State?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No We are not proposing mitigation because the only permanent impacts associated with this project are from a bridge bent.	
2b. If yes, mitigation is required by (check all that apply):	<input type="checkbox"/> DWQ <input type="checkbox"/> Corps	
2c. If yes, which mitigation option will be used for this project?	<input type="checkbox"/> Mitigation bank <input type="checkbox"/> Payment to in-lieu fee program <input type="checkbox"/> Permittee Responsible Mitigation	
3. Complete if Using a Mitigation Bank		
3a. Name of Mitigation Bank: not applicable		
3b. Credits Purchased (attach receipt and letter)	Type	Quantity
3c. Comments:		
4. Complete if Making a Payment to In-lieu Fee Program		
4a. Approval letter from in-lieu fee program is attached.	<input type="checkbox"/> Yes	
4b. Stream mitigation requested:	linear feet	
4c. If using stream mitigation, stream temperature:	<input type="checkbox"/> warm <input type="checkbox"/> cool <input type="checkbox"/> cold	
4d. Buffer mitigation requested (DWQ only):	square feet	
4e. Riparian wetland mitigation requested:	acres	
4f. Non-riparian wetland mitigation requested:	acres	
4g. Coastal (tidal) wetland mitigation requested:	acres	
4h. Comments:		
5. Complete if Using a Permittee Responsible Mitigation Plan		
5a. If using a permittee responsible mitigation plan, provide a description of the proposed mitigation plan.		

6. Buffer Mitigation (State Regulated Riparian Buffer Rules) – required by DWQ

6a. Will the project result in an impact within a protected riparian buffer that requires buffer mitigation? Yes No

6b. If yes, then identify the square feet of impact to each zone of the riparian buffer that requires mitigation. Calculate the amount of mitigation required.

Zone	6c. Reason for impact	6d. Total impact (square feet)	Multiplier	6e. Required mitigation (square feet)
Zone 1			3 (2 for Catawba)	
Zone 2			1.5	
6f. Total buffer mitigation required:				

6g. If buffer mitigation is required, discuss what type of mitigation is proposed (e.g., payment to private mitigation bank, permittee responsible riparian buffer restoration, payment into an approved in-lieu fee fund).

6h. Comments:

E. Stormwater Management and Diffuse Flow Plan (required by DWQ)	
1. Diffuse Flow Plan	
1a. Does the project include or is it adjacent to protected riparian buffers identified within one of the NC Riparian Buffer Protection Rules?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
1b. If yes, then is a diffuse flow plan included? If no, explain why. Comments:	<input type="checkbox"/> Yes <input type="checkbox"/> No
2. Stormwater Management Plan	
2a. What is the overall percent imperviousness of this project?	<i>NA</i>
2b. Does this project require a Stormwater Management Plan?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
2c. If this project DOES NOT require a Stormwater Management Plan, explain why:	
2d. If this project DOES require a Stormwater Management Plan, then provide a brief, narrative description of the plan: See attached	
2e. Who will be responsible for the review of the Stormwater Management Plan?	<input type="checkbox"/> Certified Local Government <input type="checkbox"/> DWQ Stormwater Program <input type="checkbox"/> DWQ 401 Unit
3. Certified Local Government Stormwater Review	
3a. In which local government's jurisdiction is this project?	not applicable
3b. Which of the following locally-implemented stormwater management programs apply (check all that apply):	<input type="checkbox"/> Phase II <input type="checkbox"/> NSW <input type="checkbox"/> USMP <input type="checkbox"/> Water Supply Watershed <input type="checkbox"/> Other:
3c. Has the approved Stormwater Management Plan with proof of approval been attached?	<input type="checkbox"/> Yes <input type="checkbox"/> No
4. DWQ Stormwater Program Review	
4a. Which of the following state-implemented stormwater management programs apply (check all that apply):	<input type="checkbox"/> Coastal counties <input type="checkbox"/> HQW <input type="checkbox"/> ORW <input type="checkbox"/> Session Law 2006-246 <input type="checkbox"/> Other:
4b. Has the approved Stormwater Management Plan with proof of approval been attached?	<input type="checkbox"/> Yes <input type="checkbox"/> No
5. DWQ 401 Unit Stormwater Review	
5a. Does the Stormwater Management Plan meet the appropriate requirements?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
5b. Have all of the 401 Unit submittal requirements been met?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No

F. Supplementary Information	
1. Environmental Documentation (DWQ Requirement)	
1a. Does the project involve an expenditure of public (federal/state/local) funds or the use of public (federal/state) land?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
1b. If you answered "yes" to the above, does the project require preparation of an environmental document pursuant to the requirements of the National or State (North Carolina) Environmental Policy Act (NEPA/SEPA)?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
1c. If you answered "yes" to the above, has the document review been finalized by the State Clearing House? (If so, attach a copy of the NEPA or SEPA final approval letter.) Comments:	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
2. Violations (DWQ Requirement)	
2a. Is the site in violation of DWQ Wetland Rules (15A NCAC 2H .0500), Isolated Wetland Rules (15A NCAC 2H .1300), DWQ Surface Water or Wetland Standards, or Riparian Buffer Rules (15A NCAC 2B .0200)?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
2b. Is this an after-the-fact permit application?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
2c. If you answered "yes" to one or both of the above questions, provide an explanation of the violation(s):	
3. Cumulative Impacts (DWQ Requirement)	
3a. Will this project (based on past and reasonably anticipated future impacts) result in additional development, which could impact nearby downstream water quality?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
3b. If you answered "yes" to the above, submit a qualitative or quantitative cumulative impact analysis in accordance with the most recent DWQ policy. If you answered "no," provide a short narrative description.	
4. Sewage Disposal (DWQ Requirement)	
4a. Clearly detail the ultimate treatment methods and disposition (non-discharge or discharge) of wastewater generated from the proposed project, or available capacity of the subject facility. not applicable	

5. Endangered Species and Designated Critical Habitat (Corps Requirement)		
5a. Will this project occur in or near an area with federally protected species or habitat?	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
5b. Have you checked with the USFWS concerning Endangered Species Act impacts?	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
5c. If yes, indicate the USFWS Field Office you have contacted.	<input type="checkbox"/> Raleigh <input type="checkbox"/> Asheville	
5d. What data sources did you use to determine whether your site would impact Endangered Species or Designated Critical Habitat? http://www.fws.gov/nc-es/es/countyfr.html ; Field investigations within the project study area were conducted on June 9, 2003 and July 23, 2003 by M.A. Engineering Consultants staff. The Bog turtle is T(S/A) and is not subject to section 7 Consultation and a biological conclusion is not required. For all other species listed the biological conclusion is No Effect (No Habitat).		
6. Essential Fish Habitat (Corps Requirement)		
6a. Will this project occur in or near an area designated as essential fish habitat?	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
6b. What data sources did you use to determine whether your site would impact Essential Fish Habitat?		
7. Historic or Prehistoric Cultural Resources (Corps Requirement)		
7a. Will this project occur in or near an area that the state, federal or tribal governments have designated as having historic or cultural preservation status (e.g., National Historic Trust designation or properties significant in North Carolina history and archaeology)?	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
7b. What data sources did you use to determine whether your site would impact historic or archeological resources? NEPA Documentation		
8. Flood Zone Designation (Corps Requirement)		
8a. Will this project occur in a FEMA-designated 100-year floodplain?	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
8b. If yes, explain how project meets FEMA requirements:		
8c. What source(s) did you use to make the floodplain determination? FEMA Maps		
Dr. Gregory J. Thorpe, Ph D Applicant/Agent's Printed Name	 Applicant/Agent's Signature (Agent's signature is valid only if an authorization letter from the applicant is provided.)	5-19-09 Date

STORMWATER MANAGEMENT PLAN

Project: 33161.1.1

TIP No. B-3608

Avery County

03/23/2009

Hydraulics Project Manager: Roger Weadon, P.E. (MA Engineering),
Marshal Clawson, P.E. (NCDOT Hydraulics Unit)

ROADWAY DESCRIPTION

The project B-3608 consists of constructing a two span bridge (2@60'-21" cored slab), 120 feet long to replace the existing bridge #44 in Avery County on US-19E over the North Toe River. The total project length is 0.138 miles. The project creates impacts to the North Toe River which is in the French Broad River Basin. The project drainage systems consist of roadside ditches and cross pipes culverts.

Jurisdiction Stream: North Toe River

ENVIRONMENTAL DESCRIPTION

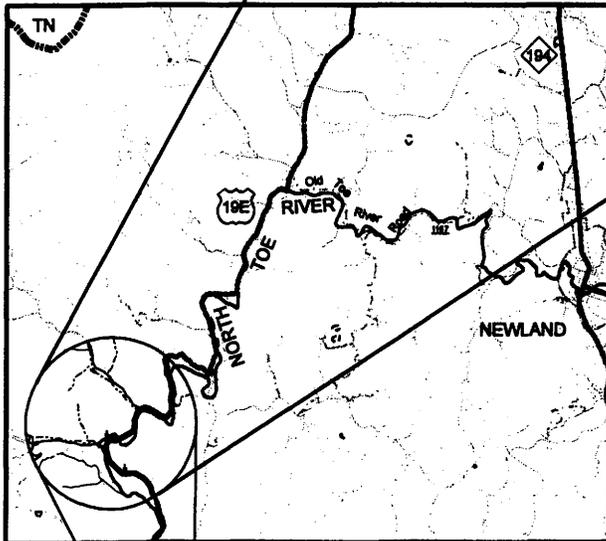
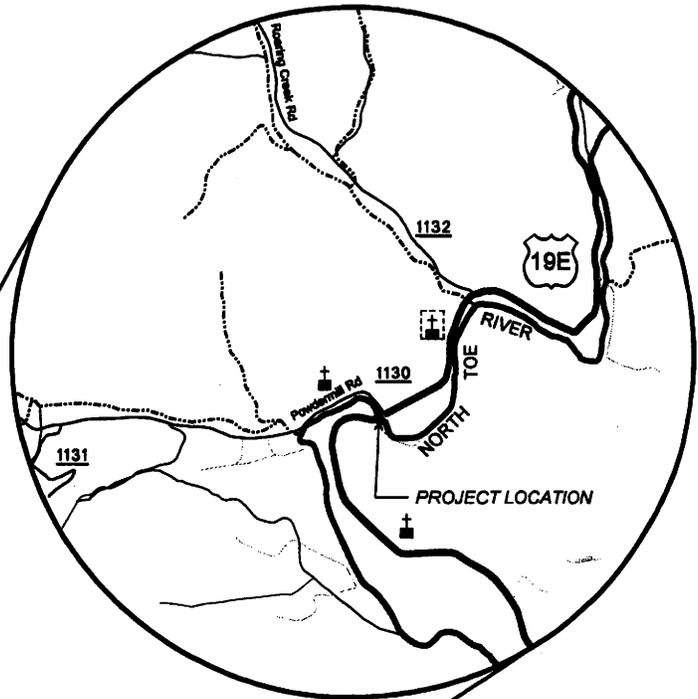
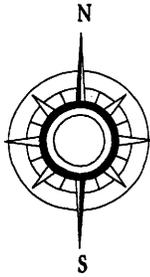
The project is located within the French Broad River Basin in Avery County. The stream is a trout stream and is classified as WS-V,Tr. The North Toe River will be impacted by the proposed project.

BEST MANAGEMENT PRACTICES AND MAJOR STRUCTURES

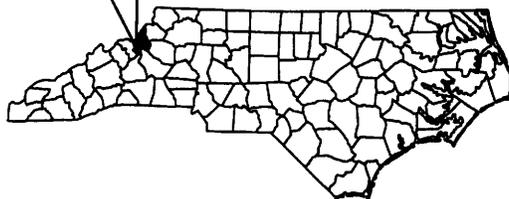
The primary goal of Best Management Practices (BMPs) is to prevent degradation of the states surface waters by the location, construction and operation of the highway system. The BMPs are activities, practices and procedures taken to prevent or reduce stormwater pollution. The BMP measures used on this project to reduce stormwater impacts are:

- Rip rap pads at pipe outlets.
- No bridge deck drains over the North Toe River

0.25 0 0.25 0.5 MILES



1 0 1 2 MILES



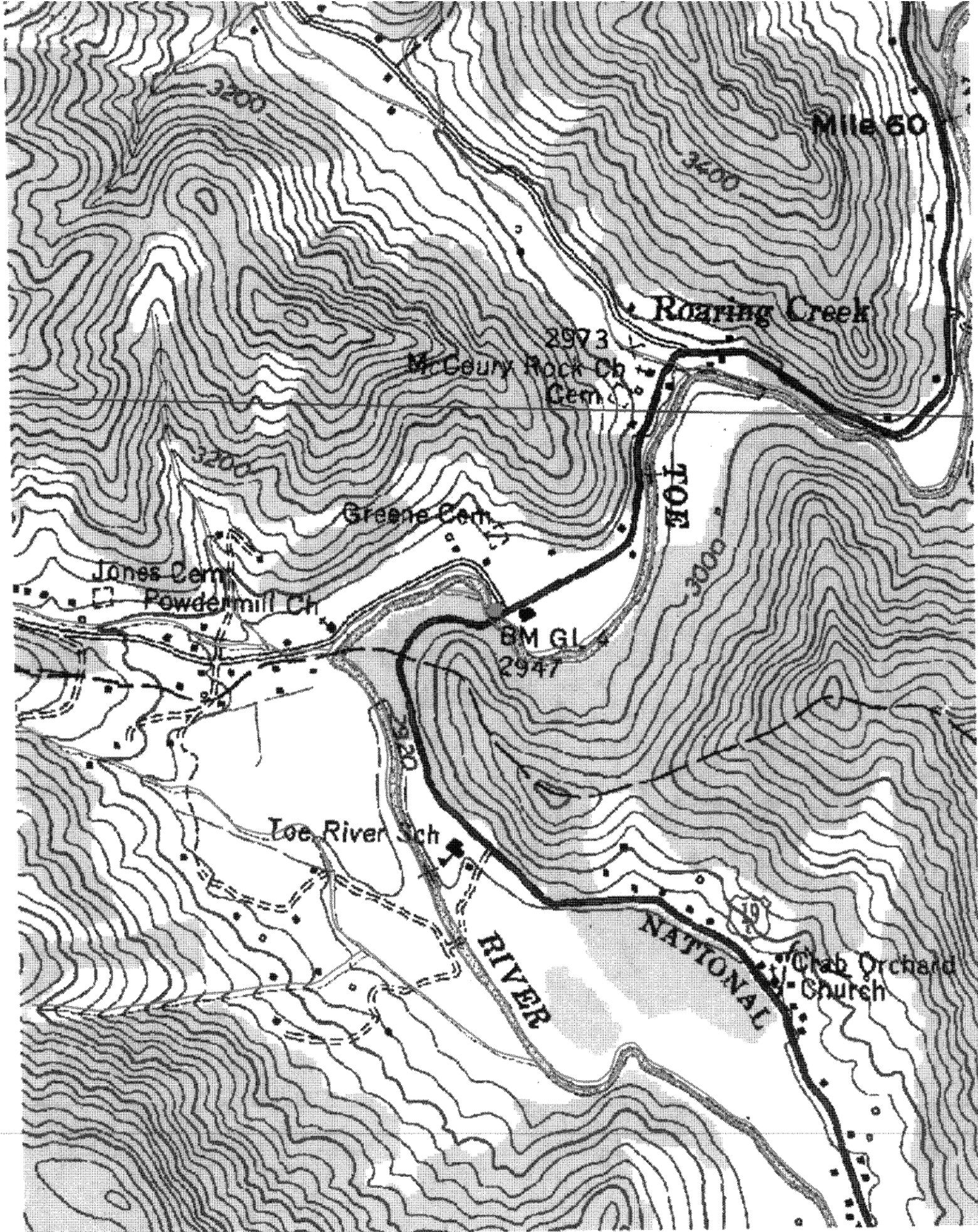
**NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
PROJECT DEVELOPMENT &
ENVIRONMENTAL ANALYSIS BRANCH**

AVERY COUNTY TIP NO. B-3608

**BRIDGE NO. 44 ON US 19 E
OVER NORTH TOE RIVER**

VICINITY MAP

Exhibit 1.1.1



Mile 60

Roaring Creek

2973

McCaury Rock Ch. Cem.

Greene Cem.

Jones Cem.

Powdermill Ch.

BM G1
2947

Toe River Sch.

TOE RIVER

NATIONAL

Crab Orchard Church

Property Owners

Parcel Number

Names

Addresses

1

Hall, Thomas & Roderick ET, AL

PO Box 35 Plumtree, NC 28664

NC DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS

AVERY COUNTY
WBS - 33161.1.1 (B-3608)

SHEET

3/30/2009

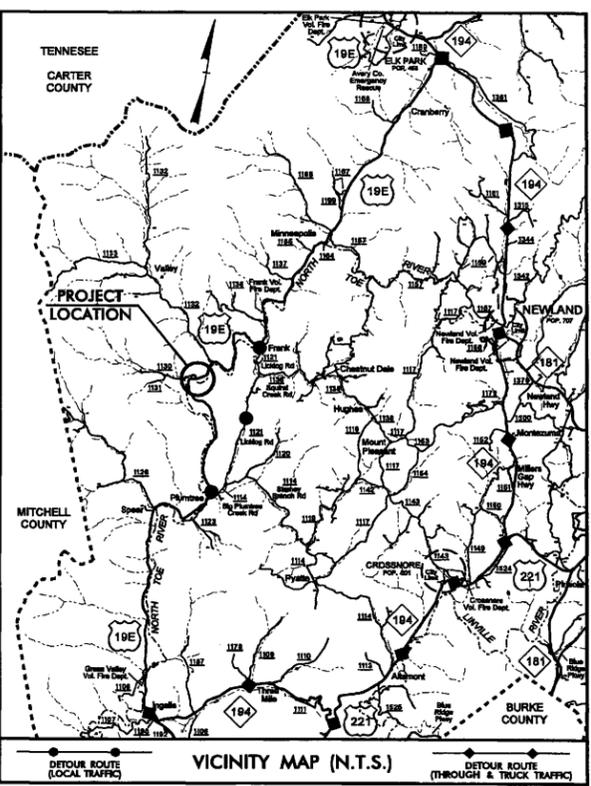
Permit Drawing
Sheet 3 of 8

02/25/2009 03:50:06 PM \\Proj\B3608_Rdy_tsh.dgn

TIP PROJECT: B-3608

CONTRACT:

See Sheet 1-A For Index of Sheets
See Sheet 1-B For Symbolology

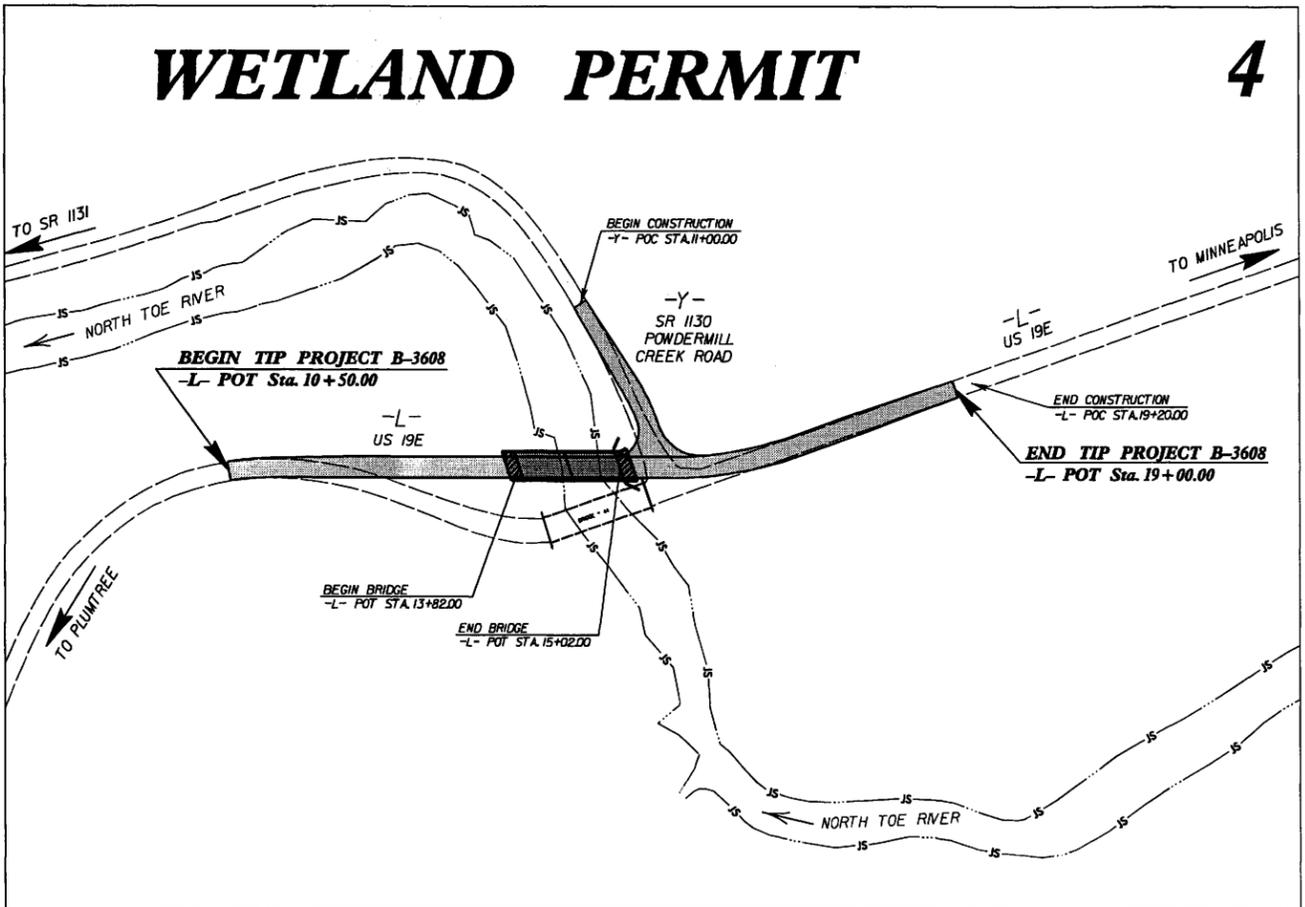


STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

AVERY COUNTY

LOCATION: BRIDGE NO. 44 OVER NORTH TOE RIVER ON US 19E
TYPE OF WORK: GRADING, DRAINAGE, PAVING, AND STRUCTURE

STATE	STATE PROJECT REFERENCE NO.	SHEET NO.	TOTAL SHEETS
N.C.	B-3608	1	
STATE PROJ. NO.	F.A. PROJ. NO.	DESCRIPTION	
33161.1.1	BRSTP-19E (3)	PE	
33161.2.1	BRSTP-19E (3)	R/W, UTILITIES	

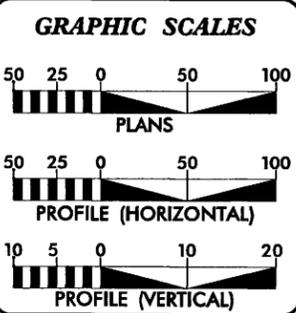


****DESIGN EXCEPTION**
MIN. HORIZ. CURVE RADIUS
HORIZONTAL SSD

CLEARING ON THIS PROJECT SHALL BE PERFORMED TO THE LIMITS ESTABLISHED BY METHOD III.
THIS PROJECT IS NOT WITHIN ANY MUNICIPAL BOUNDARIES.

PRELIMINARY PLANS
DO NOT USE FOR CONSTRUCTION

NC DOT CONTACT:
MR. DOUG TAYLOR, PE - ENGINEERING COORDINATION - PROJECT ENGINEER - ROADWAY DESIGN UNIT



DESIGN DATA

ADT 2010 =	2,070
ADT 2030 =	3,985
DHV =	9 %
D =	55 %
T =	8 % *
V =	55 MPH **
* (TTST 2% + DUAL 6%)	
FUNC. CLASS =	RURAL MAJOR COLLECTOR

PROJECT LENGTH

LENGTH ROADWAY TIP PROJECT B-3608	=	0.138 mile
LENGTH STRUCTURES TIP PROJECT B-3608	=	0.023 mile
TOTAL LENGTH TIP PROJECT B-3608	=	0.161 mile

Prepared For:
DIVISION OF HIGHWAYS
1000 Birch Ridge Dr., Raleigh NC, 27610
By:
MA ENGINEERING CONSULTANTS, INC.
598 EAST CHATHAM STREET, SUITE 137
CARY, NORTH CAROLINA 27511
(919) 297-0220

2006 STANDARD SPECIFICATIONS
RIGHT OF WAY DATE:
FEBRUARY 20, 2009

LETTING DATE:
FEBRUARY 16, 2010

ROBERT W. PORTER, JR. PE
PROJECT ENGINEER

KEVIN S. HUTCHENS
PROJECT DESIGN ENGINEER

HYDRAULICS ENGINEER

SIGNATURE: _____ P.E.

ROADWAY DESIGN ENGINEER

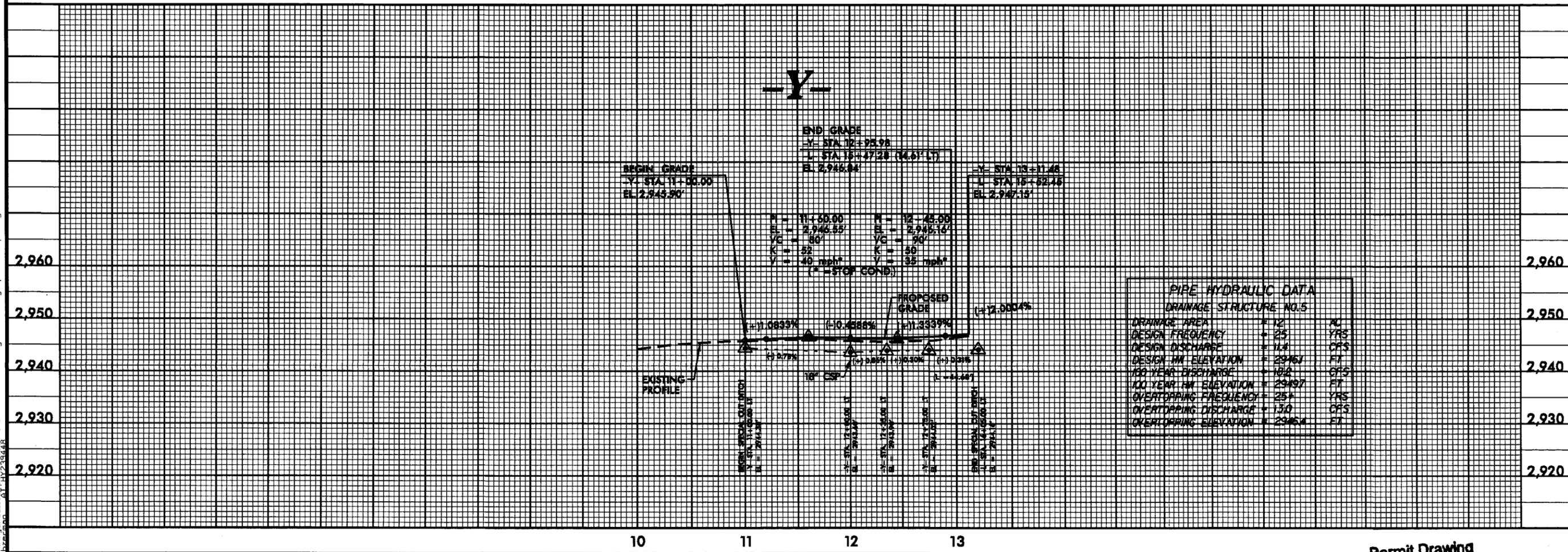
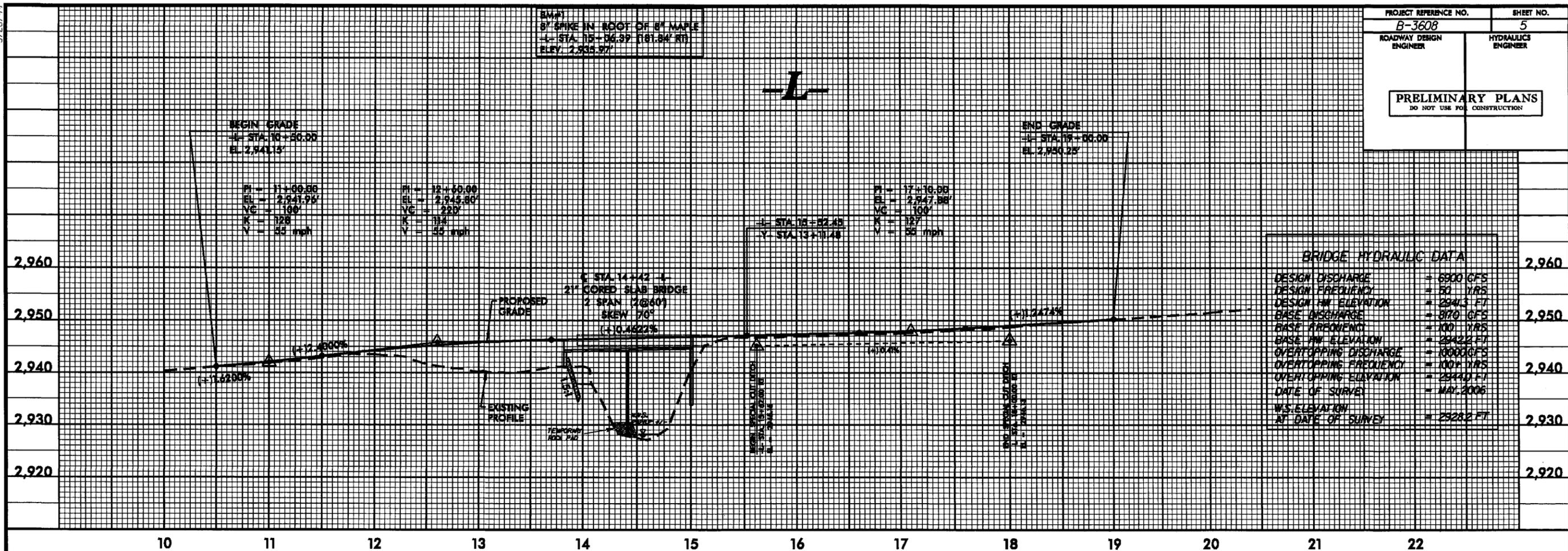
SIGNATURE: _____ P.E.

DIVISION OF HIGHWAYS
STATE OF NORTH CAROLINA

STATE HIGHWAY DESIGN ENGINEER P.E.

5/28/99

PROJECT REFERENCE NO. B-3608	SHEET NO. 5
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER
PRELIMINARY PLANS DO NOT USE FOR CONSTRUCTION	

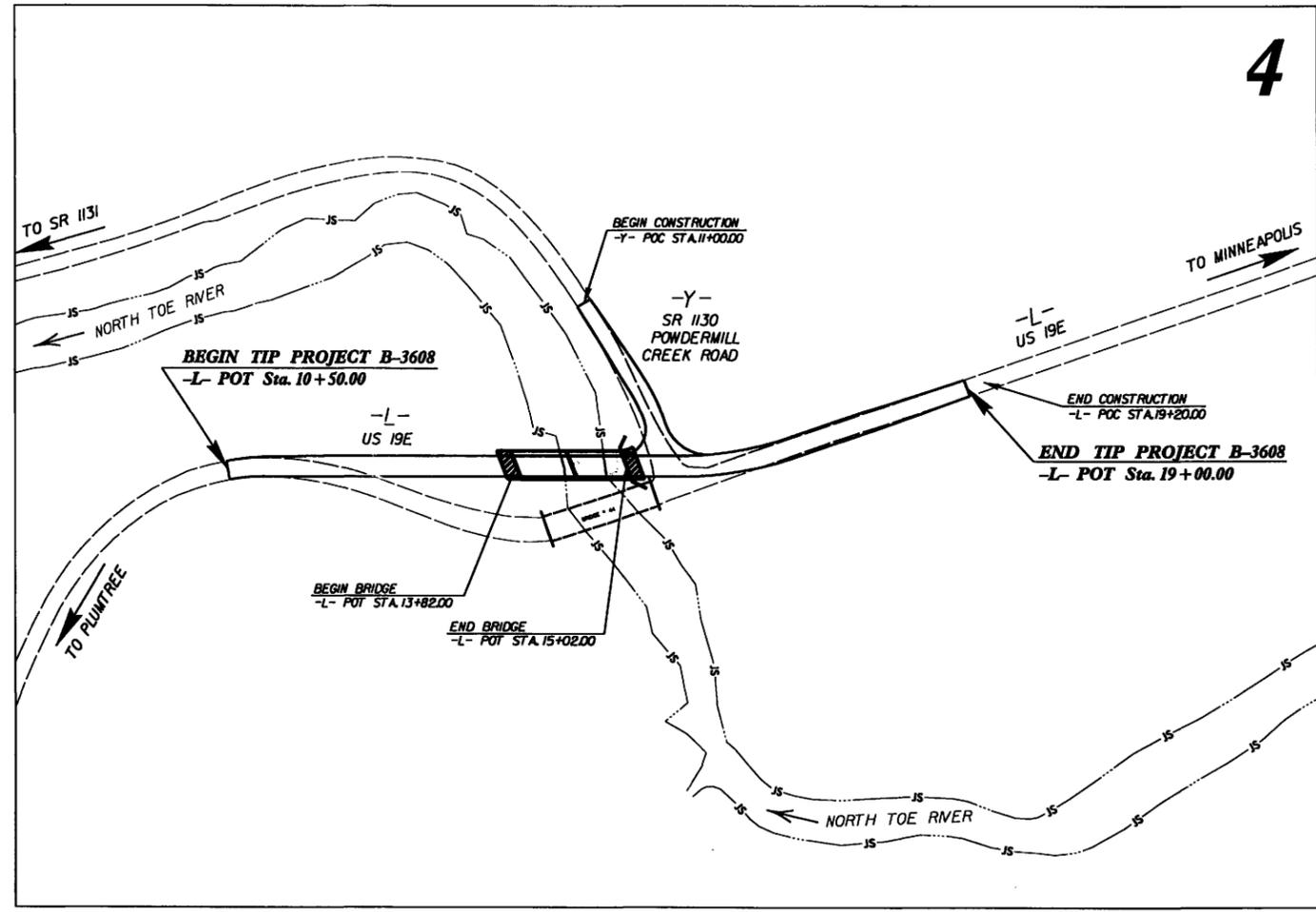
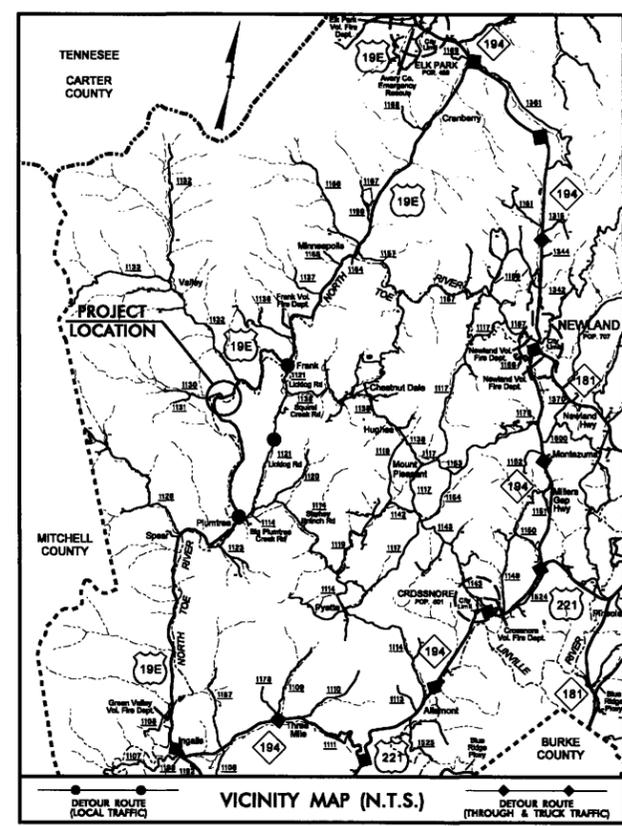


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STATE	STATE PROJECT REFERENCE NO.	SHEET NO.	TOTAL SHEETS
N.C.	B-3608	1	
STATE PROJ. NO.	F.A. PROJ. NO.	DESCRIPTION	
33161.1.1	BRSTP-19E (3)	PE	
33161.2.1	BRSTP-19E (3)	R/W, UTILITIES	

STATE OF NORTH CAROLINA
 DIVISION OF HIGHWAYS
AVERY COUNTY

LOCATION: BRIDGE NO. 44 OVER NORTH TOE RIVER ON US 19E
 TYPE OF WORK: GRADING, DRAINAGE, PAVING, AND STRUCTURE



NAD 83/86 NC GRID

PRELIMINARY PLANS
 DO NOT USE FOR CONSTRUCTION

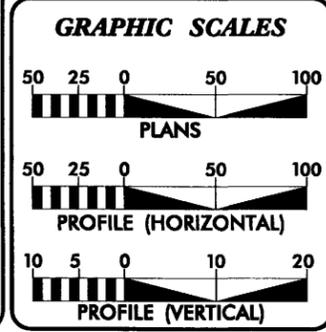
****DESIGN EXCEPTION**
 MIN. HORIZ. CURVE RADIUS
 HORIZONTAL SSD

CLEARING ON THIS PROJECT SHALL BE PERFORMED TO THE LIMITS ESTABLISHED BY METHOD III.
 THIS PROJECT IS NOT WITHIN ANY MUNICIPAL BOUNDARIES.

NC DOT CONTACT:
 MR. DOUG TAYLOR, PE - ENGINEERING COORDINATION - PROJECT ENGINEER - ROADWAY DESIGN UNIT

TIP PROJECT: B-3608

CONTRACT:



DESIGN DATA

ADT 2010	=	2,070
ADT 2030	=	3,985
DHV	=	9 %
D	=	55 %
T	=	8 % *
V	=	55 MPH **
* (TTST 2% + DUAL 6%)		
FUNC. CLASS	=	RURAL MAJOR COLLECTOR

PROJECT LENGTH

LENGTH ROADWAY TIP PROJECT B-3608	=	0.138 mile
LENGTH STRUCTURES TIP PROJECT B-3608	=	0.023 mile
TOTAL LENGTH TIP PROJECT B-3608	=	0.161 mile

Prepared For:
DIVISION OF HIGHWAYS
 1000 Birch Ridge Dr., Raleigh NC, 27610
 By:
MA ENGINEERING CONSULTANTS, INC.
 598 EAST CHATHAM STREET, SUITE 137
 GARY, NORTH CAROLINA 27531
 (919) 297-0220

2006 STANDARD SPECIFICATIONS
 RIGHT OF WAY DATE: FEBRUARY 20, 2009
 LETTING DATE: FEBRUARY 16, 2010

HYDRAULICS ENGINEER

SIGNATURE: _____ P.E.

ROADWAY DESIGN ENGINEER

SIGNATURE: _____ P.E.

DIVISION OF HIGHWAYS
 STATE OF NORTH CAROLINA

STATE HIGHWAY DESIGN ENGINEER P.E.

02/25/2009 05:09:59 PM \\pro1\B3608_rdy_tsh.dgn

Note: Not to Scale

*S.U.E. = Subsurface Utility Engineering

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

CONVENTIONAL PLAN SHEET SYMBOLS

BOUNDARIES AND PROPERTY:

State Line	-----
County Line	-----
Township Line	-----
City Line	-----
Reservation Line	-----
Property Line	-----
Existing Iron Pin	○
Property Corner	-----
Property Monument	□
Parcel/Sequence Number	(23)
Existing Fence Line	-x-x-x-
Proposed Woven Wire Fence	○
Proposed Chain Link Fence	□
Proposed Barbed Wire Fence	◇
Existing Wetland Boundary	W.S.
Proposed Wetland Boundary	W.S.
Existing Endangered Animal Boundary	EM
Existing Endangered Plant Boundary	EP

BUILDINGS AND OTHER CULTURE:

Gas Pump Vent or UG Tank Cap	○
Sign	○
Well	○
Small Mine	⊗
Foundation	□
Area Outline	□
Cemetery	⊕
Building	□
School	□
Church	⊕
Dam	▬

HYDROLOGY:

Stream or Body of Water	-----
Hydro, Pool or Reservoir	□
Jurisdictional Stream	JS
Buffer Zone 1	BZ 1
Buffer Zone 2	BZ 2
Flow Arrow	←
Disappearing Stream	→
Spring	○
Wetland	W.S.
Proposed Lateral, Tail, Head Ditch	▬
False Sump	▽

RAILROADS:

Standard Gauge	-----
RR Signal Milepost	○
Switch	□
RR Abandoned	-----
RR Dismantled	-----

RIGHT OF WAY:

Baseline Control Point	◆
Existing Right of Way Marker	△
Existing Right of Way Line	-----
Proposed Right of Way Line	-----
Proposed Right of Way Line with Iron Pin and Cap Marker	○
Proposed Right of Way Line with Concrete or Granite Marker	○
Existing Control of Access	○
Proposed Control of Access	○
Existing Easement Line	E
Proposed Temporary Construction Easement	E
Proposed Temporary Drainage Easement	TDE
Proposed Permanent Drainage Easement	PDE
Proposed Permanent Utility Easement	PUE

ROADS AND RELATED FEATURES:

Existing Edge of Pavement	-----
Existing Curb	-----
Proposed Slope Stakes Cut	C
Proposed Slope Stakes Fill	F
Proposed Wheel Chair Ramp	WCR
Proposed Wheel Chair Ramp Curb Cut	WCC
Curb Cut for Future Wheel Chair Ramp	CCFR
Existing Metal Guardrail	-----
Proposed Guardrail	-----
Existing Cable Guiderail	-----
Proposed Cable Guiderail	-----
Equality Symbol	⊕
Pavement Removal	XXXX

VEGETATION:

Single Tree	⊕
Single Shrub	⊕
Hedge	-----
Woods Line	-----
Orchard	⊕
Vineyard	Vineyard

EXISTING STRUCTURES:

MAJOR:	
Bridge, Tunnel or Box Culvert	CONC
Bridge Wing Wall, Head Wall and End Wall	CONC WW
MINOR:	
Head and End Wall	CONC HW
Pipe Culvert	-----
Footbridge	-----
Drainage Box: Catch Basin, DI or JB	CB
Paved Ditch Gutter	-----
Storm Sewer Manhole	⊕
Storm Sewer	-----

UTILITIES:

POWER:	
Existing Power Pole	●
Proposed Power Pole	○
Existing Joint Use Pole	●
Proposed Joint Use Pole	○
Power Manhole	⊕
Power Line Tower	⊗
Power Transformer	⊗
UG Power Cable Hand Hole	PH
H-Frame Pole	●
Recorded UG Power Line	-----
Designated UG Power Line (S.U.E.*)	-----

TELEPHONE:

Existing Telephone Pole	●
Proposed Telephone Pole	○
Telephone Manhole	⊕
Telephone Booth	□
Telephone Pedestal	□
Telephone Cell Tower	⊕
UG Telephone Cable Hand Hole	PH
Recorded UG Telephone Cable	-----
Designated UG Telephone Cable (S.U.E.*)	-----
Recorded UG Telephone Conduit	-----
Designated UG Telephone Conduit (S.U.E.*)	-----
Recorded UG Fiber Optics Cable	-----
Designated UG Fiber Optics Cable (S.U.E.*)	-----

WATER:

Water Manhole	⊕
Water Meter	○
Water Valve	⊗
Water Hydrant	⊕
Recorded UG Water Line	-----
Designated UG Water Line (S.U.E.*)	-----
Above Ground Water Line	A/G Water

TV:

TV Satellite Dish	⊕
TV Pedestal	□
TV Tower	⊗
UG TV Cable Hand Hole	PH
Recorded UG TV Cable	-----
Designated UG TV Cable (S.U.E.*)	-----
Recorded UG Fiber Optic Cable	-----
Designated UG Fiber Optic Cable (S.U.E.*)	-----

GAS:

Gas Valve	◇
Gas Meter	⊕
Recorded UG Gas Line	-----
Designated UG Gas Line (S.U.E.*)	-----
Above Ground Gas Line	A/G Gas

SANITARY SEWER:

Sanitary Sewer Manhole	⊕
Sanitary Sewer Cleanout	⊕
UG Sanitary Sewer Line	SS
Above Ground Sanitary Sewer	A/G Sanitary Sewer
Recorded SS Forced Main Line	FSS
Designated SS Forced Main Line (S.U.E.*)	FSS

MISCELLANEOUS:

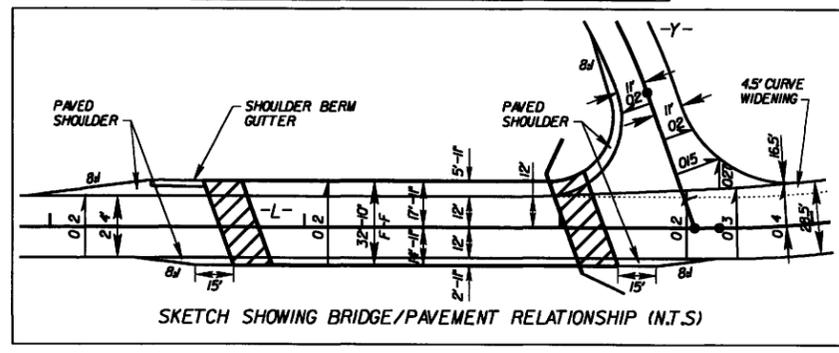
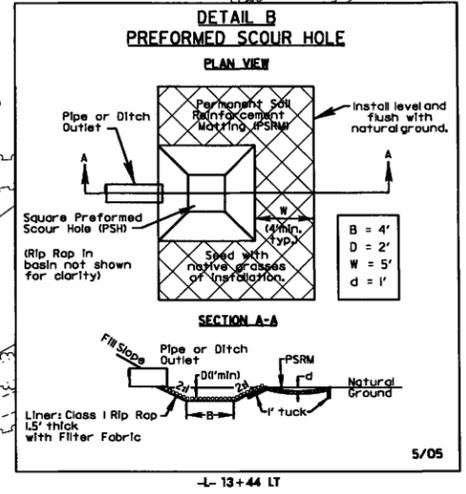
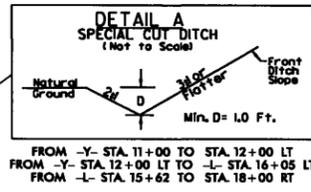
Utility Pole	●
Utility Pole with Base	□
Utility Located Object	○
Utility Traffic Signal Box	⊕
Utility Unknown UG Line	-----
UG Tank; Water, Gas, Oil	□
A/G Tank; Water, Gas, Oil	□
UG Test Hole (S.U.E.*)	⊕
Abandoned According to Utility Records	AATUR
End of Information	E.O.I.

3/15/06
02/25/2009
C:\p\proj\B3608_rdy_symb_1B.dgn

-Y-	
PI Sta 10+35.15	PI Sta 12+34.17
$\Delta = 7^{\circ} 45' 07.4" (RT)$	$\Delta = 12^{\circ} 24' 16.5" (RT)$
$D = 11^{\circ} 02' 40.2"$	$D = 28^{\circ} 38' 52.4"$
$L = 70.19'$	$L = 43.30'$
$T = 35.15'$	$T = 21.74'$
$R = 518.77'$	$R = 200.00'$
	SE = N.C.
	V = STOP COND.

-L-	
PI Sta 10+48.55	PI Sta 16+30.74
$\Delta = 20^{\circ} 45' 54.7" (RT)$	$\Delta = 19^{\circ} 25' 41.9" (LT)$
$D = 21^{\circ} 37' 15.8"$	$D = 14^{\circ} 19' 26.2"$
$L = 96.04'$	$L = 135.64'$
$T = 48.55'$	$T = 68.47'$
$R = 265.00'$	$R = 400.00'$
SE = 0.06 f1/f1 ±	SE = 0.04 f1/f1
RO = 120' (20' Incr.)	RO = 80'
V = 30 mph ±	V = 35 mph*

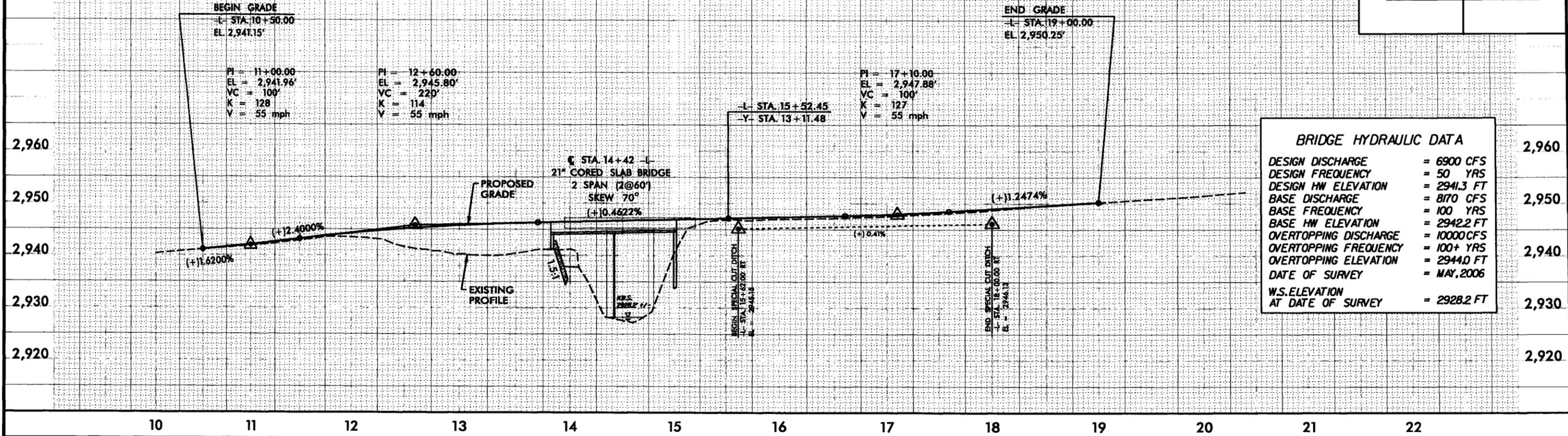
* - DESIGN EXCEPTION REQUIRED FOR MIN. HORIZ. RADIUS AND HORIZONTAL SSD.



5/28/99

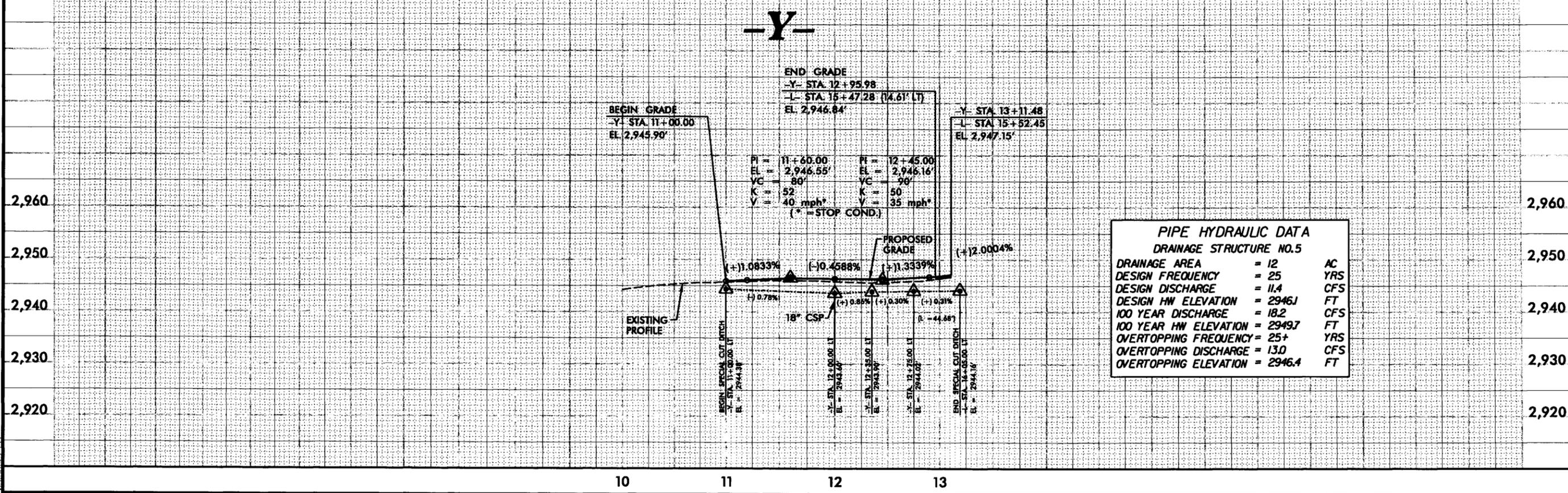
BM#1
8" SPIKE IN ROOT OF 8" MAPLE
-L- STA. 15+06.39 (181.84' RT)
ELEV. 2,935.97'

PROJECT REFERENCE NO. B-3608	SHEET NO. 5
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER
PRELIMINARY PLANS DO NOT USE FOR CONSTRUCTION	



BRIDGE HYDRAULIC DATA	
DESIGN DISCHARGE	= 6900 CFS
DESIGN FREQUENCY	= 50 YRS
DESIGN HW ELEVATION	= 2941.3 FT
BASE DISCHARGE	= 8170 CFS
BASE FREQUENCY	= 100 YRS
BASE HW ELEVATION	= 2942.2 FT
OVERTOPPING DISCHARGE	= 10000 CFS
OVERTOPPING FREQUENCY	= 100+ YRS
OVERTOPPING ELEVATION	= 2944.0 FT
DATE OF SURVEY	= MAY, 2006
W.S. ELEVATION AT DATE OF SURVEY	= 2928.2 FT

02/25/2003
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PIPE HYDRAULIC DATA	
DRAINAGE STRUCTURE NO.5	
DRAINAGE AREA	= 12 AC
DESIGN FREQUENCY	= 25 YRS
DESIGN DISCHARGE	= 11.4 CFS
DESIGN HW ELEVATION	= 2946J FT
100 YEAR DISCHARGE	= 18.2 CFS
100 YEAR HW ELEVATION	= 2949.7 FT
OVERTOPPING FREQUENCY	= 25+ YRS
OVERTOPPING DISCHARGE	= 13.0 CFS
OVERTOPPING ELEVATION	= 2946.4 FT

U.S. ARMY CORPS OF ENGINEERS
Wilmington District

Action ID: 200420399

County: Avery

Notification of Jurisdictional Determination

Property

Owner NC DOT
Mr. Roy Shelton
Address 1548 Mail Service Center
Raleigh, NC 27699-1548
Telephone Number 919 733-3141

Authorized

Agent MA Engineering
C/o Michael P. Eagan
Address 598 E. Chatham Street, Suite 137
Cary, NC 27511
Telephone Number 919 297-0221

Size and Location of Property (waterbody, Highway name/number, town, etc.) **NC DOT bridge replacement of Br 44 on US 19E project located west of Minneapolis, adjacent to North Toe River, in Avery County, North Carolina.**

Indicate Which of the Following apply:

- ◇ There are wetlands on the above described property which we strongly suggest should be delineated and surveyed. The surveyed wetland lines must be verified by our staff before the Corps will make a final jurisdictional determination on your property.
- ◇ Because of the size of your property and our present workload, our identification and delineation of your wetlands cannot be accomplished in a timely manner. You may wish to obtain a consultant to obtain a more timely delineation of the wetlands. Once the consultant has flagged a wetland line on the property, Corps staff will review it, and, if it is accurate, we strongly recommend that you have the line surveyed for final approval be the Corps. The Corps will not make a final jurisdictional determination on your property without an approved survey.

The wetlands on your property have been delineated (limits were flagged in the field), and the limits of the Corps jurisdiction have been explained to you. Unless there is a change in the law or our published regulations, this determination may be relied upon for a period not to exceed five years from the date of this notification. The area identified in the southwest quadrant of study area is not a jurisdictional wetland, the limits of the jurisdiction waters is located within the banks of North Toe River.

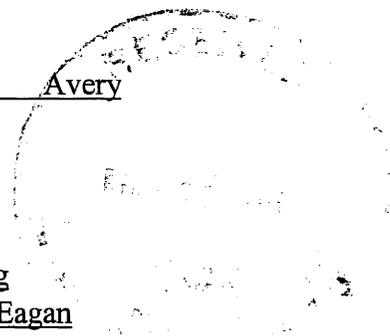
- ◇ There are no wetlands present on the above described property which are subject to the permit requirements of section 404 of the Clean Water Act (33 USC 1344). Unless there is a change in the law or our published regulations, this determination may be relied upon for a period not to exceed five years from the date of this notification.
- ◇ The project is located in one of the 20 Coastal Counties. You should contact the nearest State Office of Coastal Management to determine their requirements.

Placement of dredged or fill material in wetlands on this property without a Department of the Army permit is in most cases a violation of Section 301 of the Clean Water Act (33 USC 1311). A permit is not required for work on the property restricted entirely to existing high ground. If you have any questions regarding the Corps of Engineers regulatory program, please contact

John Thomas at 919 - 876 - 8441 extension 25
Project Manager Signature [Signature]
Date January 5, 2004 Expiration Date January 5, 2009

SURVEY PLAT OR FIELD SKETCH OF DESCRIBED PROPERTY AND THE WETLAND DELINEATION FORM MUST BE ATTACHED TO THE YELLOW (FILE) COPY OF THIS FORM.

4MH



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

Applicant: Ms. Roy Shelton / NCDOT 1548 Mail Service Center, Raleigh, N.C. 27699-1548	File Number: Action ID. 200420399	Date: January 5, 2004
Attached is:		See Section below
<input type="checkbox"/>	INITIAL PROFFERED PERMIT (Standard Permit or Letter of permission)	A
<input type="checkbox"/>	PROFFERED PERMIT (Standard Permit or Letter of permission)	B
<input type="checkbox"/>	PERMIT DENIAL	C
<input type="checkbox"/>	APPROVED JURISDICTIONAL DETERMINATION	D
<input checked="" type="checkbox"/>	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 331.

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: Raleigh Regulatory Field Office
C/o John Thomas
6508 Falls of Neuse Rd., Suite 120
Raleigh, North Carolina 27615
Telephone: (919) 876-8830 ext. 25

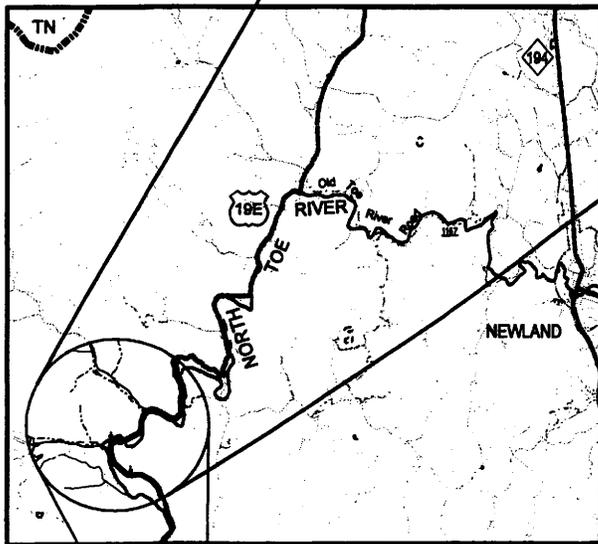
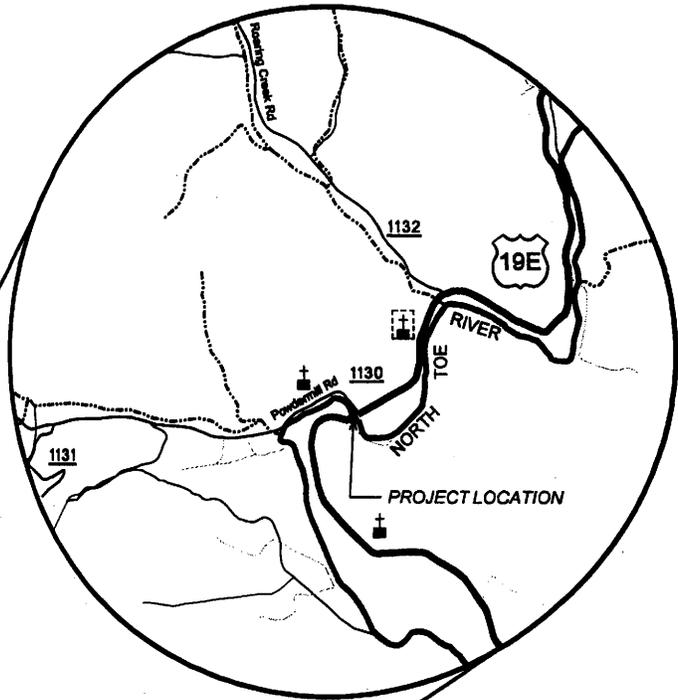
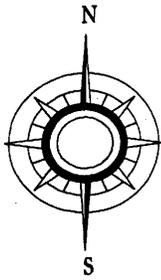
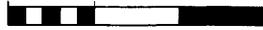
If you only have questions regarding the appeal process you may also contact:
Mr. Arthur Middleton, Administrative Appeal Review Officer
CESAD-ET-CO-R
U.S. Army Corps of Engineers, South Atlantic Division
60 Forsyth Street, Room 9M15
Atlanta, Georgia 30303-8801

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.

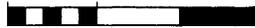
<hr/> Signature of appellant or agent.	Date:	Telephone number:
---	-------	-------------------

DIVISION ENGINEER:
Commander
U.S. Army Engineer Division, South Atlantic
60 Forsyth Street, Room 9M15
Atlanta, Georgia 30303-3490

0.25 0 0.25 0.5 MILES



1 0 1 2 MILES



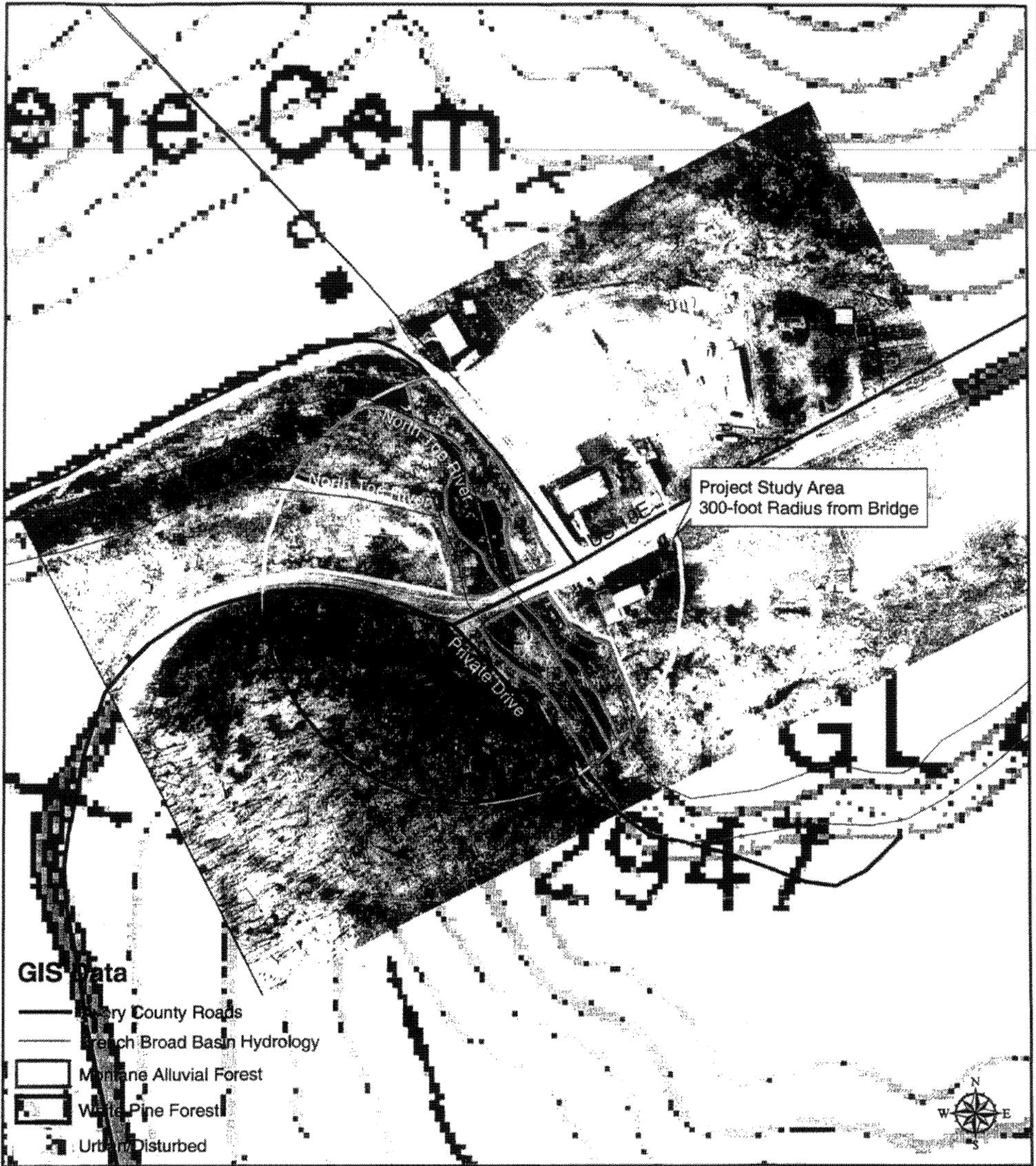
**NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
PROJECT DEVELOPMENT &
ENVIRONMENTAL ANALYSIS BRANCH**

AVERY COUNTY TIP NO. B-3608

**BRIDGE NO. 44 ON US 19 E
OVER NORTH TOE RIVER**

VICINITY MAP

Exhibit 1.1.1



B-3608
BRIDGE No. 44
OVER the NORTH TOE RIVER
AVERY COUNTY

LAND USE AND LAND COVER MAP

EXHIBIT 1.3.1

Non-Technical Descriptions

Avery County, North Carolina

Only those map units that have entries for the selected non-technical description categories are included in this report.

Map Unit DeB - Dellwood cobbly sandy loam, 1 to 5 percent slopes, occasionally flooded

Description Category: SOI

These nearly level to gently sloping, very deep, moderately well drained soils are on flood plains. These soils formed in recent alluvium. The surface layer is loamy with a significant amount of gravel and cobbles. The underlying material is stratified sand, gravel, and cobbles within a depth of 8 to 20 inches. Permeability is moderately rapid in the surface layer and rapid or very rapid in the underlying material. Shrink-swell potential is low. Seasonal high water table is within a depth of 2.0 to 4.0 feet. These soils are subject to occasional flooding.

Map Unit NkA - Nikwasi loam, 0 to 3 percent slopes, frequently flooded

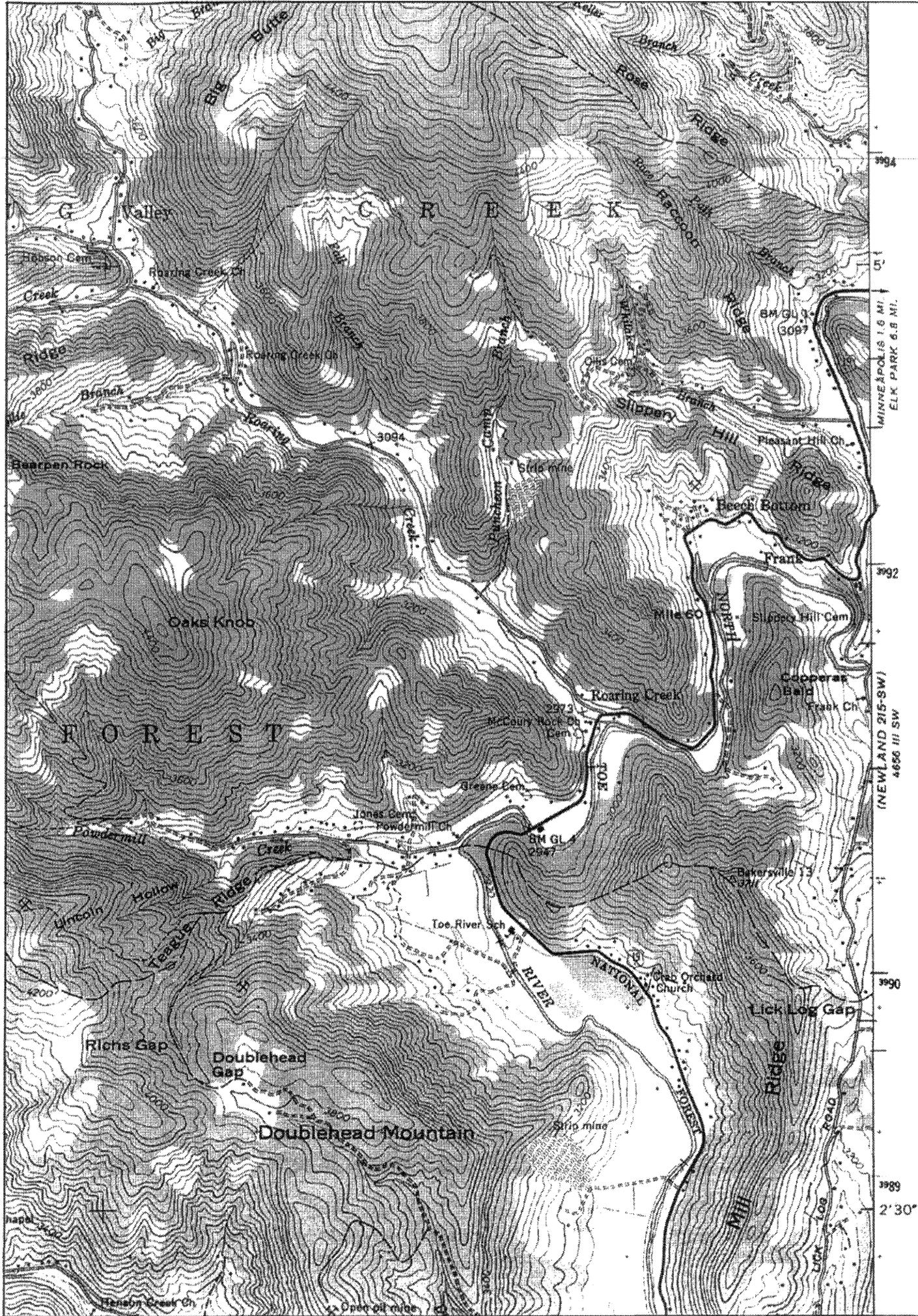
Description Category: SOI

These nearly level, very deep, poorly drained and very poorly drained soils are on flood plains. These soils formed in recent alluvium. The surface layer is thick, dark colored, and loamy. The underlying material is stratified sand, gravel, and cobbles within a depth of 24 to 40 inches. Permeability is moderately rapid in the surface layer and rapid in the underlying material. Shrink-swell potential is low. Seasonal high water table is within a depth of 1.0 foot. These soils are subject to frequent flooding.

Map Unit ShC - Saunook-thunder complex, 8 to 15 percent slopes, very stony

Description Category: SOI

This map unit consists of strong sloping Shinbone soils and Hamiller soils on uplands. These soils formed in residuum weathered from low-grade metasedimentary rocks. Shinbone soils are deep and well drained. They have a loamy surface layer and subsoil. Occasional stones are scattered over the surface. Soft bedrock is within a depth of 40 to 60 inches. Permeability is moderate and shrink-swell potential is low. Seasonal high water table is below 6.0 feet. Hamiller soils are moderately deep and well drained. They have a loamy surface layer and subsoil. Occasional stones are scattered over the surface. Soft bedrock is within a depth of 20 to 40 inches. Permeability is moderate and shrink-swell potential is low. Seasonal high water table is below 6.0 feet.



DATA FORM

**ROUTINE WETLAND DETERMINATION
(1987 COE Wetlands Delineation Manual)**

Project/Site: B3608		Date : 7/23/2003
Applicant / Owner : NCDOT		County: Avery
Investigator : Mike Eagan		State: NC
Do Normal Circumstances exist on the site?	YES NO	Community ID: Montane Alluvial Forest
Is the site significantly disturbed (Atypical Situation)?	YES NO	Transect ID
Is the area a potential Problem Area? (If needed, explain on reverse)	YES NO	Plot ID SW location

VEGETATION

Dominant Plant Species	Stratum	Indicator	Dominant Plant Species	Stratum	Indicator
1 <i>Quercus montana</i>	C	UPL	9 <i>Smilax rotundifolia</i>	Vine	FAC
2 <i>Liriodendron tulipifera</i>	C	UPL	10		
3 <i>Alnus serrulata</i>	U	FACW	11		
4 <i>Toxicodendron radicans</i>	Vine	FAC	12		
5 <i>Aesculus octandra</i>	C	--	13		
6 <i>Lysimachia ciliata</i>	Herb	FACW-	14		
7 <i>Polystichum acrostichoides</i>	Herb	FAC	15		
8 <i>Podophyllum peltatum</i>	Herb	FACU	16		
Percent of Dominant Species that are OBL, FACW, or FAC (excluding FAC-) 30					
Remarks					

HYDROLOGY

<input type="checkbox"/> Recorded Data (Describe in Remarks) <ul style="list-style-type: none"> <input type="checkbox"/> Stream, Lake, or Tide Gauge <input type="checkbox"/> Aerial Photographs <input type="checkbox"/> Other X No Recorded Data Available		WETLAND HYDROLOGY INDICATORS	
FIELD OBSERVATIONS		Primary Indicators: <ul style="list-style-type: none"> <input type="checkbox"/> Inundated <input type="checkbox"/> Saturated in Upper 12 Inches <input type="checkbox"/> Water Marks <input type="checkbox"/> Drift Lines <input type="checkbox"/> Sediment Deposits X Drainage Patterns in Wetlands 	
Depth of Surface Water	(in)	Secondary Indicators (2 or more Required): <ul style="list-style-type: none"> <input type="checkbox"/> Oxidized Root Channels in Upper 12 Inches <input type="checkbox"/> Water-Stained Leaves <input type="checkbox"/> Local Soil Survey Data <input type="checkbox"/> FAC-Neutral Test <input type="checkbox"/> Other (Explain in Remarks) 	
Depth to Free Water in Pit	(in)		
Depth to Saturated Soil	(in)		

SOILS

Map Unit Name (Series and Phase): Dellwood cobbly sandy loam			Drainage Class: Unknown		
Taxonomy (Subgroup) mesic Oxyaquic Dystrudepts		Field Observations Confirm Mapped Type? YES NO			
PROFILE DESCRIPTION					
Depth (inches)	Horizon	Matrix Color (Munsell Moist)	Mottle Colors (Munsell Moist)	Mottle Abundance/Contrast	Texture, Concretions, Structure, etc.
0-16		10 YR 4/4		0	Loamy sand
16-24		10 YR 5/6			Sandy gravel
HYDRIC SOIL INDICATORS:					
<input type="checkbox"/> Histosol		<input type="checkbox"/> Concretions			
<input type="checkbox"/> Histic Epipedon		<input type="checkbox"/> High Organic Content in Surface Layer in Sandy Soils			
<input type="checkbox"/> Sulfidic Odor		<input type="checkbox"/> Organic Streaking in Sandy Soils			
<input type="checkbox"/> Aquic Moisture Regime		<input type="checkbox"/> Listed on Local Hydric Soils List			
<input type="checkbox"/> Reducing Conditions		<input type="checkbox"/> Listed on National Hydric Soils List			
<input type="checkbox"/> Gleyed or Low-Chroma Colors		<input type="checkbox"/> Other (Explain in Remarks)			
Remarks: there was light streaking in the upper 6 inches. Gravel was encountered at 16 inches and auger would go no deeper than 24 inches. No water entered the hole after twenty minutes.					

WETLAND DETERMINATION

Hydrophytic Vegetation Present?	YES	NO	Is this Sampling Point Within a Wetland? YES NO
Wetland Hydrology Present?	YES	NO	
Hydric Soils Present?	YES	NO	
Remarks: There is evidence of hydrology and some vegetation is classified as hydrophytic. Soils did not exhibit hydric characteristics.			