



STATE OF NORTH CAROLINA  
DEPARTMENT OF TRANSPORTATION

BEVERLY PERDUE  
GOVERNOR

EUGENE CONTI  
SECRETARY

October 26, 2009

MEMORANDUM TO: Mr. Mike Mills, PE  
Division Seven Engineer

FROM: Philip S. Harris, III, P.E., Unit Head  
Natural Environment Unit  
Project Development and Environmental Analysis Branch

SUBJECT: Orange County, SR 1733 (Weaver Dairy Road) Improvements from NC 86  
(Martin Luther King, Jr. Boulevard) to SR 1734 (Erwin Road); T.I.P. Number U-  
3306; Federal Aid Project No. STP-1733(11); State Project No. 8.2501601

Attached are the U.S. Army Corps of Engineers Section 404 Individual Permit and N.C. Division of Water Quality Section 401 Individual Water Quality Certification for the above referenced project. All environmental permits have been received for the construction of this project.

A copy of this permit package will be posted on the NCDOT website at:  
<http://www.ncdot.gov/doh/preconstruct/pe/neu/permit.html>

PSH/gyb

Attachment

Cc: W/attachment  
Mr. Randy Garris, P.E. State Contract Officer  
Mr. Jerry Parker, Division Environmental Officer  
Ms. Beth Harmon, EEP

Cc: W/o attachment (see website for attachments)  
Mr. Majed Alghandour, P. E., Programming and TIP  
Mr. Jay Bennett, P.E., Roadway Design  
Dr. David Chang, P.E., Hydraulics  
Mr. Art McMillan, P.E., Highway Design  
Mr. Tom Koch, P.E., Structure Design  
Mr. Mark Staley, Roadside Environmental  
Mr. John F. Sullivan, FHWA  
Mr. Ron Hancock, P.E., State Roadway Construction Engineer  
Mr. Mike Robinson, P.E., State Bridge Construction Engineer  
Mr. Bill Goodwin, P.E., PDEA Bridge Unit Head

## **PROJECT COMMITMENTS**

SR 1733 (Weaver Dairy Road) Improvements  
From NC 86 (Martin Luther King, Jr. Boulevard) to  
SR 1734 (Erwin Road)  
Chapel Hill, Orange County  
WBS Element No. 34913.1.1  
Federal Project No. STP-1733(11)  
State Project No. 8.2501601  
T.I.P No. U-3306

### **Commitments Developed Through Project Development and Design**

#### **Roadway Design**

- Property owners access to Country Road will be maintained “as is”, as requested by the residents of Country Road. Under no circumstances will the driveways serving these properties be connected directly to the improved Weaver Dairy Road (SR 1733).
- The final design of the project will preserve “as is” the brick walls adjacent to the Chesley and Silver Creek neighborhoods.
- A five-foot striped bicycle lane will be provided in each direction of travel along SR 1733 (Weaver Dairy Road). Additionally, sidewalks will be provided along both sides of the road for the entire project length except for the Cedar Falls Park area. An existing path within the park located adjacent to Weaver Dairy Road, will be used to connect the ends of the sidewalk.
- Bus pull-offs at designated stops along Weaver Dairy Road (WDR) will be included as part of the project. The following locations for pull-offs have been agreed upon by the Town and NCDOT:
  - Eastbound WDR at entrance to Timberlyne Shopping Center
  - Westbound WDR at Vilcom Drive
  - Eastbound WDR west of Timberlyne Drive
  - Westbound WDR at entrance to Kensington Trace
  - Eastbound WDR west of Cedar Hills Drive
  - Westbound WDR west of Cedar Hills Drive
  - Eastbound WDR at Steeplechase Road
  - Westbound WDR east of Steeplechase Road
  - Westbound WDR at Entrance to Bus Lot of Chapel Hill High School

- Eastbound WDR at Entrance to Bus Lot of Chapel Hill High School
- Eastbound WDR at Chesley Court
- Westbound WDR at San Sophia Drive
- Eastbound WDR at Perry Creek Drive
- Westbound WDR at Perry Creek Drive

### **Signals and Geometrics Unit**

- Installation of a flashing signal on Weaver Dairy Road for the Chapel Hill High School has been requested by the Town of Chapel Hill and will be studied and installed if warranted.

### **Division 7**

- Landscaping and fencing at the entrance to the Carol Woods Retirement Community will not be disturbed during construction

### **Commitments Developed Through the Permitting Process**

#### **Natural Environment Unit**

- Compensatory mitigation for the loss of 460 linear feet of stream, associated with the proposed project, shall be provided by the Ecosystem Enhancement Program (EEP), as outlined in the letter dated April 30, 2009 from William D. Gilmore, EEP Director. Pursuant to the EEP Memorandum of Agreement (MOA) between the State of North Carolina and the US Army Corps of Engineers signed on July 22, 2003, EEP will provide 920 linear feet of warm-water restoration equivalent stream mitigation in the Haw River basin (Hydrologic Cataloging Unit 03030002) by one year of the date of this permit. The NCDOT shall, within 30 days of the issue date of this permit, certify that sufficient funds have been provided to EEP to complete the required mitigation, pursuant to Paragraph V. of the MOA.

*Action Taken: Completed*

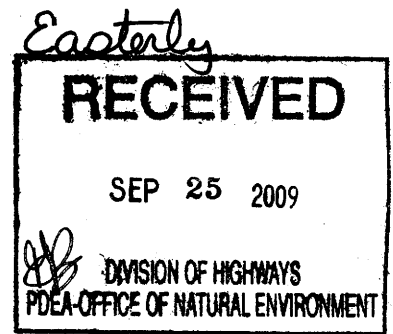
### **Roadside Environmental and Division 7**

At site 3, channel relocation shall be completed and stabilized, and approved on site by DWQ staff, prior to diverting water into the new channel. If matting is used on stream banks, it shall be limited to coir-fiber. Vegetation used for bank stabilization shall be limited to native riparian vegetation, and should include establishment of a vegetated buffer on both sides of the relocated channel to the maximum extent practical. Also, rip-rap is allowable on the stream banks to the extent requested in the permit application, however it shall not be placed in the stream bed.



REPLY TO  
ATTENTION OF:

DEPARTMENT OF THE ARMY  
WILMINGTON DISTRICT, CORPS OF ENGINEERS  
69 DARLINGTON AVENUE  
WILMINGTON, NORTH CAROLINA 28403-1343



September 23, 2009

Regulatory Division

Action ID: SAW-2009-00700

Dr. Gregory J. Thorpe, PhD, Manager  
Project Development and Environmental Analysis Branch  
N.C. Department of Transportation  
Division of Highways  
1598 Mail Service Center  
Raleigh, North Carolina 27699-1598

Dear Dr. Thorpe:

Enclosed is a Department of the Army permit to authorize the proposed permanent placement of fill material into 470 linear feet of perennial stream channel. Also included within the permit is the temporary impact 87 linear feet of jurisdictional stream channels. These impacts are associated with the roadway widening project identified as U-3306. The project site is located from the intersection of NC 86 (Martin Luther King Jr. Boulevard) at SR 1733 (Weaver Dairy Road) and extends 2.7 miles southeastward to the intersection of Sage Road and SR 1734 (Erwin Road) in Chapel Hill, Orange County, North Carolina.

Any deviation in the authorized work will likely require modification of this permit. If a change in the authorized work is necessary, you should promptly submit revised plans to the Corps showing the proposed changes. You may not undertake the proposed changes until the Corps notifies you that your permit has been modified.

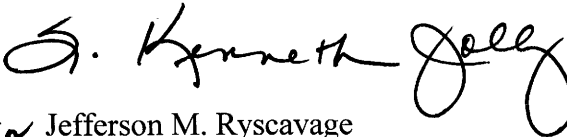
Carefully read your permit. The general and special conditions are important. Your failure to comply with these conditions could result in a violation of Federal law. Certain significant conditions require that:

- a. You must complete construction before December 31, 2014.
- b. You must allow representatives from this office to make periodic visits to your worksite as deemed necessary to assure compliance with permit plans and conditions.

You must notify this office in advance as to when you intend to commence and complete work.

You should address all questions regarding this authorization to Andrew Williams,  
Regulatory Division, Raleigh Regulatory Field Office, telephone (919) 554-4884 extension 26.

Sincerely,

  
to Jefferson M. Ryscavage  
Colonel, U.S. Army  
District Commander

Enclosures

Copy Furnished (with enclosures):

Chief, Source Data Unit  
NOAA/National Ocean Service  
ATTN: Sharon Tear N/CS261  
1315 East-West Hwy., Rm 7316  
Silver Spring, Maryland 20910-3282

Copies Furnished (with special conditions and plans):

Mr. Ronald J. Mikulak, Chief  
Wetlands Regulatory Section  
61 Forsyth Street  
Atlanta, Georgia 30303

Mr. Pete Benjamin  
U.S. Fish and Wildlife Service  
Fish and Wildlife Enhancement  
Post Office Box 33726  
Raleigh, North Carolina 27636-3726

Mr. Ron Sechler  
National Marine Fisheries Service  
Pivers Island  
Beaufort, North Carolina 28516

Mr. Doug Huggett  
Division of Coastal Management  
N.C. Department of Environment  
and Natural Resources  
400 Commerce Avenue  
Morehead City, North Carolina 28557

Mr. David Rackley  
National Marine Fisheries Service  
219 Fort Johnson Road  
Charleston, South Carolina 29412-9110

## DEPARTMENT OF THE ARMY PERMIT

Permittee: NORTH CAROLINA DEPARTMENT OF TRANSPORTATION  
ATTN: MR. GREGORY THORPE

Permit No: SAW-2009-00700

Issuing Office: USAED, WILMINGTON

**RECEIVED**

SEP 21 2009

**REGULATORY  
WILM.FLD.OFC.**

**NOTE:** The term “you” and its derivatives, as used in this permit, means the permittee or any future transferee. The term “this office” refers to the appropriate district or division office of the Corps of Engineers having jurisdiction over the permitted activity or the appropriate official of the office acting under the authority of the commanding officer.

**You are authorized to perform work in the accordance with the terms and conditions specified below.**

**Project Description:** The project, identified as U-3306, consists of improvements to 2.7 miles of SR 1733, also known as Weaver Dairy Road, and includes a four-lane median divided facility from NC 86 (Martin Luther King Jr. Boulevard) to Kingston Drive, and a three-lane typical section for the remainder of the project from Kingston Drive eastward to SR 1734 (Erwin Road). From the western portion terminus, NC 86 (Martin Luther King, Jr. Boulevard), the project will follow the existing alignment of SR 1733 (Weaver Dairy Road) for approximately 2.2 miles. The proposed alignment will then be on new location for approximately 0.40 miles to the intersection of Sage Road and SR 1734 (Erwin Road), the eastern project terminus. Total permanent impacts for the construction of this project are 470 linear feet of perennial stream channel. Temporary impacts total 87 linear feet of the perennial stream channel, associated with equipment and construction access. The applicant will mitigate for unavoidable impacts to streams by payment into the North Carolina Ecosystem Enhancement Program in the amount necessary to perform the restoration of 920 linear feet of warm water streams (460 linear feet of stream impacts at a 2:1 ratio) within the in the Cape Fear River Basin (HUC 03030002).

**Project Location:** The project, known as U-3306, begins at the intersection of NC 86 (Martin Luther King Jr. Boulevard) at SR 1733 (Weaver Dairy Road) and extends 2.7 miles southeastward to the intersection of Sage Road and SR 1734 (Erwin Road) in Chapel Hill, Orange County, North Carolina. Coordinates (in decimal degrees) for the site are 35.9624° N, -79.0373° W. The site contains the headwater portion of Cedar Fork Creek and two unnamed tributaries to Cedar Fork Creek. Cedar Fork Creek flows to Booker Creek, Little Creek and Jordan Lake downstream of the project site. Jordan Lake discharges to the Haw River, which flows to Cape Fear River, a navigable water of the United States.

### Permit Conditions:

#### General Conditions:

1. The time limit for completing the work authorized ends on December 31, 2014. If you find that you need more time to complete the authorized activity, submit your request for a time extension to this office for consideration at least one month before the above date is reached.

2. You must maintain the activity authorized by this permit in good condition and in conformance with the terms and conditions of this permit. You are not relieved of this requirement if you abandon the permitted activity, although you may make a good faith transfer to a third party in compliance with General Conditions 4 below. Should you wish to cease to maintain the authorized activity or should you desire to abandon it without a good faith transfer, you must obtain a modification of this permit from this office, which may require restoration of the area.

3. If you discover any previously unknown historic or archeological remains while accomplishing the activity authorized by this permit, you must immediately notify this office of what you have found. We will initiate the Federal and state coordination required to determine if the remains warrant a recovery effort or if the site eligible for listing in the National Register of Historic Places.

4. If you sell the property associated with this permit, you must obtain the signature of the new owner in the space provided and forward a copy of the permit to this office to validate the transfer of this authorization.

5. If a conditioned water quality certification has been issued for your project, you must comply with the conditions specified in the certification as special conditions to this permit. For your convenience, a copy of the certification is attached if it contains such conditions.

6. You must allow representatives from this office to inspect the authorized activity at any time deemed necessary to ensure that it is being or has been accomplished in accordance with the terms and conditions of your permit.

### **Special Conditions:**

\*SEE ATTACHED SPECIAL CONDITIONS

### **Further Information:**

1. **Congressional Authorities:** You have been authorized to undertake the activity described above pursuant to:

( ) Section 10 of the Rivers and Harbors Act of 1899 (33 U.S. C. 403).

(X) Section 404 of the clean Water Act (33 U.S.C. 1344).

( ) Section 103 of the Marine Protection, Research and Sanctuaries Act of 1972 (33 U.S.C. 1413).

2. **Limits of this authorization.**

a. This permit does not obviate the need to obtain other Federal, state, or local authorizations required by law.

b. This permit does not grant any property rights or exclusive privileges.

c. This permit does not authorize any injury to the property or rights of others.

d. This permit does not authorize interference with any existing or proposed Federal project.

3. **Limits of Federal Liability.** In issuing this permit, the Federal Government does not assume any liability for the following:

a. Damages to the permitted project or uses thereof as a result of other permitted or unpermitted activities or from natural causes.

b. Damages to the permitted project or uses thereof as a result of current or future activities undertaken by or on behalf of the United states in the public interest.

- c. Damages to persons, property, or to other permitted or unpermitted activities or structures caused by the activity authorized by this permit.
  - d. Design or construction deficiencies associated with the permitted work.
  - e. Damage claims associated with any future modification, suspension, or revocation of this permit.
4. **Reliance on Applicant's Data:** The determination of this office that issuance of this permit is not contrary to the public interest was made in reliance on the information you provided.
5. **Reevaluation of Permit Decision.** This office may reevaluate its decision on this permit at any time the circumstances warrant. Circumstances that could require a reevaluation include, but are not limited to, the following:
- a. You fail to comply with the terms and conditions of this permit.
  - b. The information provided by you in support of your permit application proves to have been false, incomplete, or inaccurate (see 4 above).
  - c. Significant new information surfaces which this office did not consider in reaching the original public interest decision.

Such a reevaluation may result in a determination that it is appropriate to use the suspension, modification, and revocation procedures contained in 33 CFR 325.7 or enforcement procedures such as those contained in 33CFR 326.4 and 326.5. The referenced enforcement procedures provide for the issuance of an administrative order requiring you to comply with the terms and conditions of your permit and for the initiation of legal action where appropriate. You will be required to pay for any corrective measures ordered by this office, and if you fail to comply with such directive, this office may in certain situations (such as those specified in 33 CFR 209.170) accomplish the corrective measure by contract or otherwise and bill you for the cost.

6. **Extensions.** General condition 1 establishes a time limit for the completion of the activity authorized by this permit. Unless there are circumstances requiring either a prompt completion of the authorized activity or a reevaluation of the public interest decision, the Corps will normally give favorable consideration to a request for an extension of this time limit.

Your signature below, as permittee, indicates that you accept and agree to comply with the terms and conditions of this permit.

E. P. Lusk for 9.18.09  
 (PERMITEE) GREGORY THORPE - NCDOT (DATE)

This permit becomes effective when the Federal official, designated to act for the Secretary of the Army, has signed below.

S. Kenneth Jolly 9/24/09  
 (DISTRICT COMMANDER) JEFFERSON M. RYSCAVAGE, COLONEL (DATE)

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

\_\_\_\_\_  
 (TRANSFEE) (DATE)





North Carolina Department of Environment and Natural Resources

Division of Water Quality  
Coleen H. Sullins  
Director

Dee Freeman  
Secretary

Beverly Eaves Perdue  
Governor

August 7, 2009 **RECEIVED**

AUG 13 2009

RALPH REGULATOR FIELD OFFICE

Dr. Greg Thorpe, PhD., Manager  
Project Development and Environmental Analysis  
North Carolina Department of Transportation  
1548 Mail Service Center  
Raleigh, North Carolina, 27699-1548

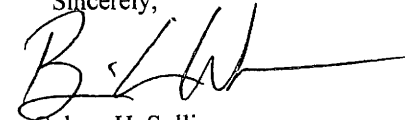
Subject: 401 Water Quality Certification Pursuant to Section 401 of the Federal Clean Water Act with ADDITIONAL CONDITIONS for Proposed improvements to SR 1733 (Weaver Dairy Road) from NC 86 (Martin Luther King, Jr. Boulevard) to SR 1734 (Erwin Road) in Chapel Hill, Orange County, Federal Aid Project No. STP-1733(11), State Project No.8.2501601, TIP U-3306. NCDWQ Project No. 20090375, Individual Certification No. WQ003807.

Dear Dr. Thorpe:

Attached hereto is a copy of Certification No. WQ003807 issued to The North Carolina Department of Transportation (NCDOT) dated August 7, 2009

If we can be of further assistance, do not hesitate to contact us.

Sincerely,

  
for Coleen H. Sullins  
Director

Attachments

- cc: Andy Williams, US Army Corps of Engineers, Raleigh Field Office
- Jerry Parker, Division 7 Environmental Officer
- Kathy Matthews, Environmental Protection Agency (electronic copy only)
- Travis Wilson, NC Wildlife Resources Commission
- Beth Harmon, Ecosystem Enhancement Program
- Amy Euliss, NCDWQ Winston Salem Regional Office
- File Copy

**401 Water Quality Certification Pursuant to Section 401 of the Federal Clean Water Act with ADDITIONAL CONDITIONS**

**THIS CERTIFICATION** is issued in conformity with the requirements of Section 401 Public Laws 92-500 and 95-217 of the United States and subject to the North Carolina Division of Water Quality (NCDWQ) Regulations in 15 NCAC 2H .0500. This certification authorizes the NCDOT to impact 557 linear feet of jurisdictional streams in Orange County. The project shall be constructed pursuant to the application dated March 25, 2009, with additional information received April 14, 2009, May 4, 2009, and July 29, 2009. The authorized impacts are as described below:

<b>Stream Impacts in the Cape Fear River Basin</b>					
<b>Site</b>	<b>Stream name</b>	<b>Permanent Fill in Perennial Stream (linear ft)</b>	<b>Temporary Fill in Perennial Stream (linear ft)</b>	<b>Total Stream Impact (linear ft)</b>	<b>Stream Impacts Requiring Mitigation (linear ft)</b>
1	Cedar Fork Creek	81	22	103	81
2	UT1 to Cedar Fork Creek	0	9	9	0
3a	UT2 to Cedar Fork Creek	259	29	288	259
3b	UT3 to Cedar Fork Creek	47	10	57	0
4	Cedar Fork Creek	83	17	100	83
<b>Total</b>		<b>470</b>	<b>87</b>	<b>557</b>	<b>423</b>

**Total Stream Impacts for Project: 557 linear feet**

The application provides adequate assurance that the discharge of fill material into the waters of the Cape River Basin in conjunction with the proposed development will not result in a violation of applicable Water Quality Standards and discharge guidelines. Therefore, the State of North Carolina certifies that this activity will not violate the applicable portions of Sections 301, 302, 303, 306, 307 of PL 92-500 and PL 95-217 if conducted in accordance with the application and conditions hereinafter set forth.

This approval is only valid for the purpose and design that you submitted in your application dated March 25, 2009, with additional information received April 14, 2009, May 4, 2009, and July 29, 2009. Should your project change, you are required to notify the NCDWQ and submit a new application. If the property is sold, the new owner must be given a copy of this Certification and approval letter, and is thereby responsible for complying with all the conditions. If any additional wetland impacts, or stream impacts, for this project (now or in the future) exceed one acre or 150 linear feet, respectively, additional compensatory mitigation may be required as described in 15A NCAC 2H .0506 (h) (6) and (7). For this approval to remain valid, you are required to comply with all the conditions listed below. In addition, you should obtain all other federal, state or local permits before proceeding with your project including (but not limited to) Sediment and Erosion control, Coastal Stormwater, Non-discharge and Water Supply watershed regulations. This Certification shall expire on the same day as the expiration date of the corresponding Corps of Engineers Permit.

**Condition(s) of Certification:**

*Project Specific Conditions*

1. Compensatory mitigation for 423 linear feet of impact to streams is required. We understand that you have chosen to perform compensatory mitigation for impacts to streams through the North Carolina Ecosystem Enhancement Program (EEP), and that the EEP has agreed to implement the mitigation for the project. EEP has indicated in a letter dated April 30, 2009 that they will assume responsibility for satisfying the federal Clean Water Act compensatory mitigation requirements for the above-referenced project, in accordance with the Tri-Party MOA signed on July 22, 2003 and the Dual-Party MOA signed on April 12, 2004.
2. At site 3, channel relocations shall be completed and stabilized, and approved on site by DWQ staff, prior to diverting water into the new channel. If matting is used on stream banks, it shall be limited to coir-fiber. Vegetation used for bank stabilization shall be limited to native riparian vegetation, and should include establishment of a vegetated buffer on both sides of the relocated channel to the maximum extent practical. Also, rip-rap is allowable on the stream banks to the extent requested in the permit application, however it shall not be placed in the stream bed.

### *General Conditions*

3. Unless otherwise approved in this certification, placement of culverts and other structures in waters, streams, and wetlands shall be placed below the elevation of the streambed by one foot for all culverts with a diameter greater than 48 inches, and 20 percent of the culvert diameter for culverts having a diameter less than 48 inches, to allow low flow passage of water and aquatic life. Design and placement of culverts and other structures including temporary erosion control measures shall not be conducted in a manner that may result in dis-equilibrium of wetlands or streambeds or banks, adjacent to or upstream and down stream of the above structures. The applicant is required to provide evidence that the equilibrium is being maintained if requested in writing by NCDWQ. If this condition is unable to be met due to bedrock or other limiting features encountered during construction, please contact NCDWQ for guidance on how to proceed and to determine whether or not a permit modification will be required.
4. The use of rip-rap above the Normal High Water Mark shall be minimized. Any rip-rap placed for stream stabilization shall be placed in stream channels in such a manner that the rip rap does not impede aquatic life passage.
5. If concrete is used during construction, a dry work area shall be maintained to prevent direct contact between curing concrete and stream water. Water that inadvertently contacts uncured concrete shall not be discharged to surface waters due to the potential for elevated pH and possible aquatic life and fish kills.
6. During the construction of the project, no staging of equipment of any kind is permitted in waters of the U.S., or protected riparian buffers.
7. The dimension, pattern and profile of the stream above and below the crossing shall not be modified. Disturbed floodplains and streams shall be restored to natural geomorphic conditions.
8. The Permittee shall ensure that the final design drawings adhere to the permit and to the permit drawings submitted for approval.
9. All work in or adjacent to stream waters shall be conducted in a dry work area. Approved BMP measures from the most current version of NCDOT Construction and Maintenance Activities manual such as sandbags, rock berms, cofferdams and other diversion structures shall be used to prevent excavation in flowing water.
10. Heavy equipment shall be operated from the banks rather than in the stream channel in order to minimize sedimentation and reduce the introduction of other pollutants into the stream.
11. All mechanized equipment operated near surface waters must be regularly inspected and maintained to prevent contamination of stream waters from fuels, lubricants, hydraulic fluids, or other toxic materials.
12. No rock, sand or other materials shall be dredged from the stream channel except where authorized by this certification.
13. Discharging hydroseed mixtures and washing out hydroseeders and other equipment in or adjacent to surface waters is prohibited.
14. The permittee and its authorized agents shall conduct its activities in a manner consistent with State water quality standards (including any requirements resulting from compliance with §303(d) of the Clean Water Act) and any other appropriate requirements of State and Federal law. If NCDWQ determines that such standards or laws are not being met (including the failure to sustain a designated or achieved use) or that State or federal law is being violated, or that further conditions are necessary to assure compliance, NCDWQ may reevaluate and modify this certification.
15. A copy of this Water Quality Certification shall be maintained on the construction site at all times. In addition, the Water Quality Certification and all subsequent modifications, if any, shall be maintained with the Division Engineer and the on-site project manager.
16. The outside buffer, wetland or water boundary located within the construction corridor approved by this authorization shall be clearly marked by highly visible fencing prior to any land disturbing activities. Impacts to areas within the fencing are prohibited unless otherwise authorized by this certification.

17. The issuance of this certification does not exempt the Permittee from complying with any and all statutes, rules, regulations, or ordinances that may be imposed by other government agencies (i.e. local, state, and federal) having jurisdiction, including but not limited to applicable buffer rules, stormwater management rules, soil erosion and sedimentation control requirements, etc.
18. The Permittee shall report any violations of this certification to the Division of Water Quality within 24 hours of discovery.
19. Upon completion of the project (including any impacts at associated borrow or waste sites), the NCDOT Division Engineer shall complete and return the enclosed "Certification of Completion Form" to notify NCDWQ when all work included in the 401 Certification has been completed.
20. Native riparian vegetation must be reestablished within the construction limits of the project by the end of the growing season following completion of construction.
21. There shall be no excavation from, or waste disposal into, jurisdictional wetlands or waters associated with this permit without appropriate modification. Should waste or borrow sites, or access roads to waste or borrow sites, be located in wetlands or streams, compensatory mitigation will be required since that is a direct impact from road construction activities.
22. Erosion and sediment control practices must be in full compliance with all specifications governing the proper design, installation and operation and maintenance of such Best Management Practices in order to protect surface waters standards:
  - a. The erosion and sediment control measures for the project must be designed, installed, operated, and maintained in accordance with the most recent version of the *North Carolina Sediment and Erosion Control Planning and Design Manual*.
  - b. The design, installation, operation, and maintenance of the sediment and erosion control measures must be such that they equal, or exceed, the requirements specified in the most recent version of the *North Carolina Sediment and Erosion Control Manual*. The devices shall be maintained on all construction sites, borrow sites, and waste pile (spoil) projects, including contractor-owned or leased borrow pits associated with the project.
  - c. For borrow pit sites, the erosion and sediment control measures must be designed, installed, operated, and maintained in accordance with the most recent version of the *North Carolina Surface Mining Manual*.
  - d. The reclamation measures and implementation must comply with the reclamation in accordance with the requirements of the Sedimentation Pollution Control Act.
23. Sediment and erosion control measures shall not be placed in wetlands or waters unless otherwise approved by this Certification.

Violations of any condition herein set forth may result in revocation of this Certification and may result in criminal and/or civil penalties. This Certification shall become null and void unless the above conditions are made conditions of the Federal 404 and/or Coastal Area Management Act Permit. This Certification shall expire upon the expiration of the 404 or CAMA permit.

If this Certification is unacceptable to you have the right to an adjudicatory hearing upon written request within sixty (60) days following receipt of this Certification. This request must be in the form of a written petition conforming to Chapter 150B of the North Carolina General Statutes and filed with the Office of Administrative Hearings, 6714 Mail Service Center, Raleigh, N.C. 27699-6714. If modifications are made to an original Certification, you have the right to an adjudicatory hearing on the modifications upon written request within sixty (60) days following receipt of the Certification. Unless such demands are made, this Certification shall be final and binding.

This the 7th day of August 2009

DIVISION OF WATER QUALITY



for Coleen H. Sullins  
Director

WQC No. WQ003807

NCDWQ Project No.: \_\_\_\_\_

County: \_\_\_\_\_

Applicant: \_\_\_\_\_

Project Name: \_\_\_\_\_

Date of Issuance of 401 Water Quality Certification: \_\_\_\_\_

**Certificate of Completion**

Upon completion of all work approved within the 401 Water Quality Certification or applicable Buffer Rules, and any subsequent modifications, the applicant is required to return this certificate to the 401 Transportation Permitting Unit, North Carolina Division of Water Quality, 1650 Mail Service Center, Raleigh, NC, 27699-1650. This form may be returned to NCDWQ by the applicant, the applicant's authorized agent, or the project engineer. It is not necessary to send certificates from all of these.

**Applicant's Certification**

I, \_\_\_\_\_, hereby state that, to the best of my abilities, due care and diligence was used in the observation of the construction such that the construction was observed to be built within substantial compliance and intent of the 401 Water Quality Certification and Buffer Rules, the approved plans and specifications, and other supporting materials.

Signature: \_\_\_\_\_ Date: \_\_\_\_\_

**Agent's Certification**

I, \_\_\_\_\_, hereby state that, to the best of my abilities, due care and diligence was used in the observation of the construction such that the construction was observed to be built within substantial compliance and intent of the 401 Water Quality Certification and Buffer Rules, the approved plans and specifications, and other supporting materials.

Signature: \_\_\_\_\_ Date: \_\_\_\_\_

**Engineer's Certification**

\_\_\_\_\_ Partial \_\_\_\_\_ Final

I, \_\_\_\_\_, as a duly registered Professional Engineer in the State of North Carolina, having been authorized to observe (periodically, weekly, full time) the construction of the project, for the Permittee hereby state that, to the best of my abilities, due care and diligence was used in the observation of the construction such that the construction was observed to be built within substantial compliance and intent of the 401 Water Quality Certification and Buffer Rules, the approved plans and specifications, and other supporting materials.

Signature \_\_\_\_\_ Registration No. \_\_\_\_\_

Date \_\_\_\_\_

**SPECIAL CONDITIONS (Action ID. 200900700); NC Department of Transportation/TIP U3306**

**Work Limits**

1. All work authorized by this permit must be performed in strict compliance with the attached plans, which are a part of this permit. Any modification to these plans must be approved by the US Army Corps of Engineers (USACE) prior to implementation.
2. Except as authorized by this permit or any USACE approved modification to this permit, no excavation, fill or mechanized land-clearing activities shall take place at any time in the construction or maintenance of this project, within waters or wetlands. This permit does not authorize temporary placement or double handling of excavated or fill material within waters or wetlands outside the permitted area. This prohibition applies to all borrow and fill activities connected with this project.
3. Except as specified in the plans attached to this permit, no excavation, fill or mechanized land-clearing activities shall take place at any time in the construction or maintenance of this project, in such a manner as to impair normal flows and circulation patterns within waters or wetlands or to reduce the reach of waters or wetlands.
4. 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.

**Related Laws**

5. All mechanized equipment will be regularly inspected and maintained to prevent contamination of waters and wetlands from fuels, lubricants, hydraulic fluids, or other toxic materials. In the event of a spill of petroleum products or any other hazardous waste, the permittee shall immediately report it to the N.C. Division of Water Quality at (919) 807-6300, or (800) 858-0368 and provisions of the North Carolina Oil Pollution and Hazardous Substances Control Act will be followed.

**Project Maintenance**

6. The permittee shall advise the Corps in writing prior to beginning the work authorized by this permit and again upon completion of the work authorized by this permit.
7. Unless otherwise authorized by this permit, all fill material placed in waters or wetlands shall be generated from an upland source and will be clean and free of any pollutants except in trace quantities. Metal products, organic materials (including debris from land clearing activities), or unsightly debris will not be used.
8. The permittee shall require its contractors and/or agents to comply with the terms and conditions of this permit in the construction and maintenance of this project, and shall provide each of its contractors and/or agents associated with the construction or maintenance of this project with a copy of this permit. A copy of this permit, including all conditions, shall be available at the project site during construction and maintenance of this project.

**SPECIAL CONDITIONS (Action ID. 200900700); NC Department of Transportation/TIP U3306**

9. The permittee shall employ all sedimentation and erosion control measures necessary to prevent an increase in sedimentation or turbidity within waters and wetlands outside the permit area. This shall include, but is not limited to, the immediate installation of silt fencing or similar appropriate devices around all areas subject to soil disturbance or the movement of earthen fill, and the immediate stabilization of all disturbed areas. Additionally, the project must remain in full compliance with all aspects of the Sedimentation Pollution Control Act of 1973 (North Carolina General Statutes Chapter 113A Article 4).

10. The permittee, upon receipt of a notice of revocation of this permit or upon its expiration before completion of the work will, without expense to the United States and in such time and manner as the Secretary of the Army or his authorized representative may direct, restore the water or wetland to its pre-project condition.

**Enforcement**

11. Violations of these conditions or violations of Section 404 of the Clean Water Act or Section 10 of the Rivers and Harbors Act must be reported in writing to the Wilmington District U.S. Army Corps of Engineers within 24 hours of the permittee's discovery of the violation.

**Culverts**

12. All authorized culverts will be installed to allow the passage of low stream flows and the continued movement of fish and other aquatic life as well as to prevent headcutting of the streambed. For all box culverts and for pipes greater than 48 inches in diameter, the bottom of the pipe will be buried at least one foot below the bed of the stream unless burial would be impractical and the Corps of Engineers has waived this requirement. For culverts 48 inches in diameter or smaller, the bottom of the pipe must be buried below the bed of the stream to a depth equal to or greater than 20 percent of the diameter of the culvert. Design and placement of culverts and other structures including temporary erosion control measures shall not be conducted in a manner that may result in disequilibrium of wetlands or streambeds or banks, adjacent to, upstream or downstream of the structures. In order to allow for the continued movement of bed load and aquatic organisms, existing stream channel widths and depths will be maintained at the inlet and outlet ends of culverts. Riprap armoring of streams at culvert inlets and outlets shall be minimized above the ordinary high water elevation in favor of bioengineering techniques such as bank sloping, erosion control matting and revegetation with deep-rooted, woody plants.

**Pre-Construction Meeting**

13. The permittee shall schedule a preconstruction meeting between its representatives, the contractor's representatives, and the Corps of Engineers, Raleigh Regulatory Field Office, NCDOT Regulatory Project Manager, prior to any work within jurisdictional waters and wetlands to ensure that there is a mutual understanding of all of the terms and conditions contained within this Department of the Army Permit. The permittee shall provide the USACE, Raleigh Regulatory Field Office, NCDOT Regulatory Project Manager, with a copy of the final plans at least two weeks prior to the preconstruction meeting along with a



**SPECIAL CONDITIONS (Action ID. 200900700); NC Department of Transportation/TIP U3306)**

description of any changes that have been made to the project's design, construction methodology or construction timeframe. The permittee shall schedule the preconstruction meeting for a time when the USACE and North Carolina Division of Water Quality (NCDWQ) Project Managers can attend. The permittee shall invite the Corps and NCDWQ Project Managers a minimum of thirty (30) days in advance of the scheduled meeting in order to provide those individuals with ample opportunity to schedule and participate in the required meeting.

**Borrow and Waste**

14. To ensure that all borrow and waste activities occur on high ground and do not result in the degradation of adjacent wetlands and streams, except as authorized by this permit, the permittee shall require its contractors and/or agents to identify all areas to be used to borrow material, or to dispose of dredged, fill, or waste material. The permittee shall provide the USACE with appropriate maps indicating the locations of proposed borrow or waste sites as soon as the permittee has that information. The permittee will coordinate with the USACE before approving any borrow or waste sites that are within 400 feet of any streams or wetlands. All jurisdictional wetland lines on borrow and waste sites shall be verified by the Corps of Engineers and shown on the approved reclamation plans. The permittee shall ensure that all such areas comply with Special Condition b) of this permit, and shall require and maintain documentation of the location and characteristics of all borrow and disposal sites associated with this project. This information will include data regarding soils, vegetation and hydrology sufficient to clearly demonstrate compliance with the Special Condition b). All information will be available to the USACE upon request. NCDOT shall require its contractors to complete and execute reclamation plans for each waste and borrow site and provide written documentation that the reclamation plans have been implemented and all work is completed. This documentation will be provided to the Corps of Engineers within 30 days of the completion of the reclamation work.

**EEP Mitigation**

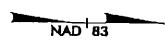
15. NC-EEP STREAM MITIGATION: Compensatory mitigation for the loss of 460 linear feet of stream, associated with the proposed project, shall be provided by the Ecosystem Enhancement Program (EEP), as outlined in the letter dated April 30, 2009 from William D. Gilmore, EEP Director. Pursuant to the EEP Memorandum of Agreement (MOA) between the State of North Carolina and the US Army Corps of Engineers signed on July 22, 2003, the EEP will provide 920 linear feet of warm-water restoration equivalent stream mitigation in the Haw River basin (Hydrologic Cataloging Unit 03030002) by one year of the date of this permit. The NCDOT shall, within 30 days of the issue date of this permit, certify that sufficient funds have been provided to EEP to complete the required mitigation, pursuant to Paragraph V. of the MOA.



SA W-2009-00700  
 Project Plans  
 Sheet 2 of 15

**1-1**  
 P1 Sta. 41+59.46  
 Δ = 27' 30.6"  
 L = 29.62'  
 T = 145.95'  
 SE = 2500.00'  
 NO = 52

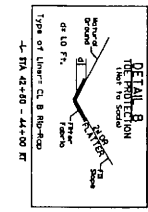
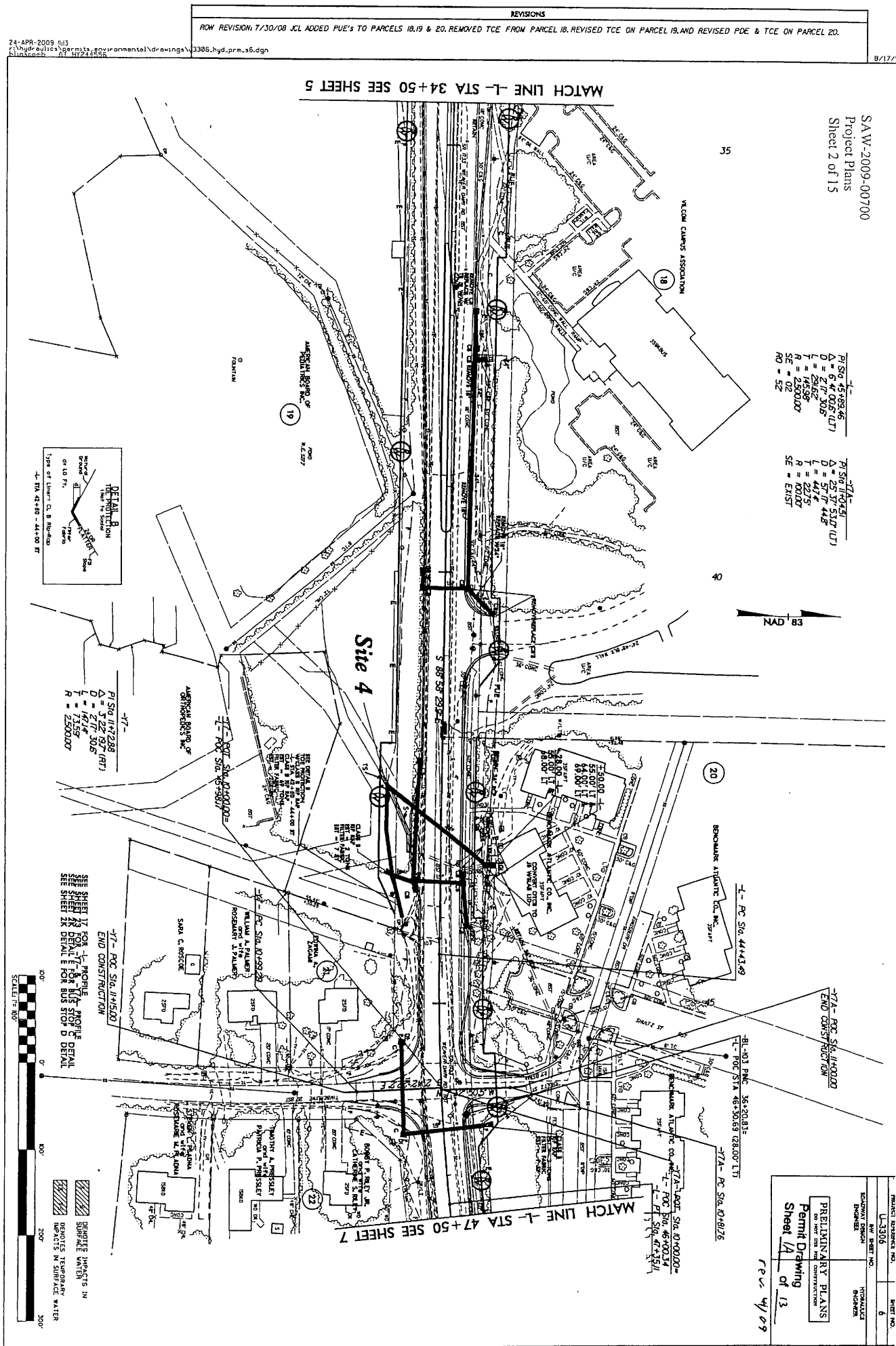
**7-1A**  
 P1 Sta. 41+51.07 (U)  
 Δ = 57' 44.8"  
 L = 44.7'  
 T = 22.75'  
 SE = 40.00'  
 EXIST



MATCH LINE L- STA 34+50 SEE SHEET 5

Site 4

MATCH LINE L- STA 47+50 SEE SHEET 7



**7-7**  
 P1 Sta. 41+72.88  
 Δ = 3' 22' 9.97" (AT)  
 L = 12.14'  
 T = 7.359'  
 R = 2500.00'

**7-7**  
 P1 Sta. 41+51.00  
 END CONSTRUCTION



PROJECT NUMBER NO.	U-3306	SHEET NO.	6
DATE	11/13/09	PROJECT	VALUUM CAMPUS ASSOCIATION
DESIGNED BY	PERMITTING	DATE	11/13/09
DRAWN BY	PERMITTING	SCALE	AS SHOWN
CHECKED BY	PERMITTING	PROJECT	VALUUM CAMPUS ASSOCIATION
APPROVED BY	PERMITTING	DATE	11/13/09
<b>PRELIMINARY PLANS</b> <b>Permit Drawing</b> Sheet 14 of 13 rev 4/09			

REVISIONS  
 ROW REVISION: 7/30/08 JCL ADDED PUE'S TO PARCELS 18,19 & 20. REMOVED TCE FROM PARCEL 18. REVISED TCE ON PARCEL 19, AND REVISED PDE & TCE ON PARCEL 20.

24-APR-2009 8:13  
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 3385.dwg AT 11/24/09

8/17/09

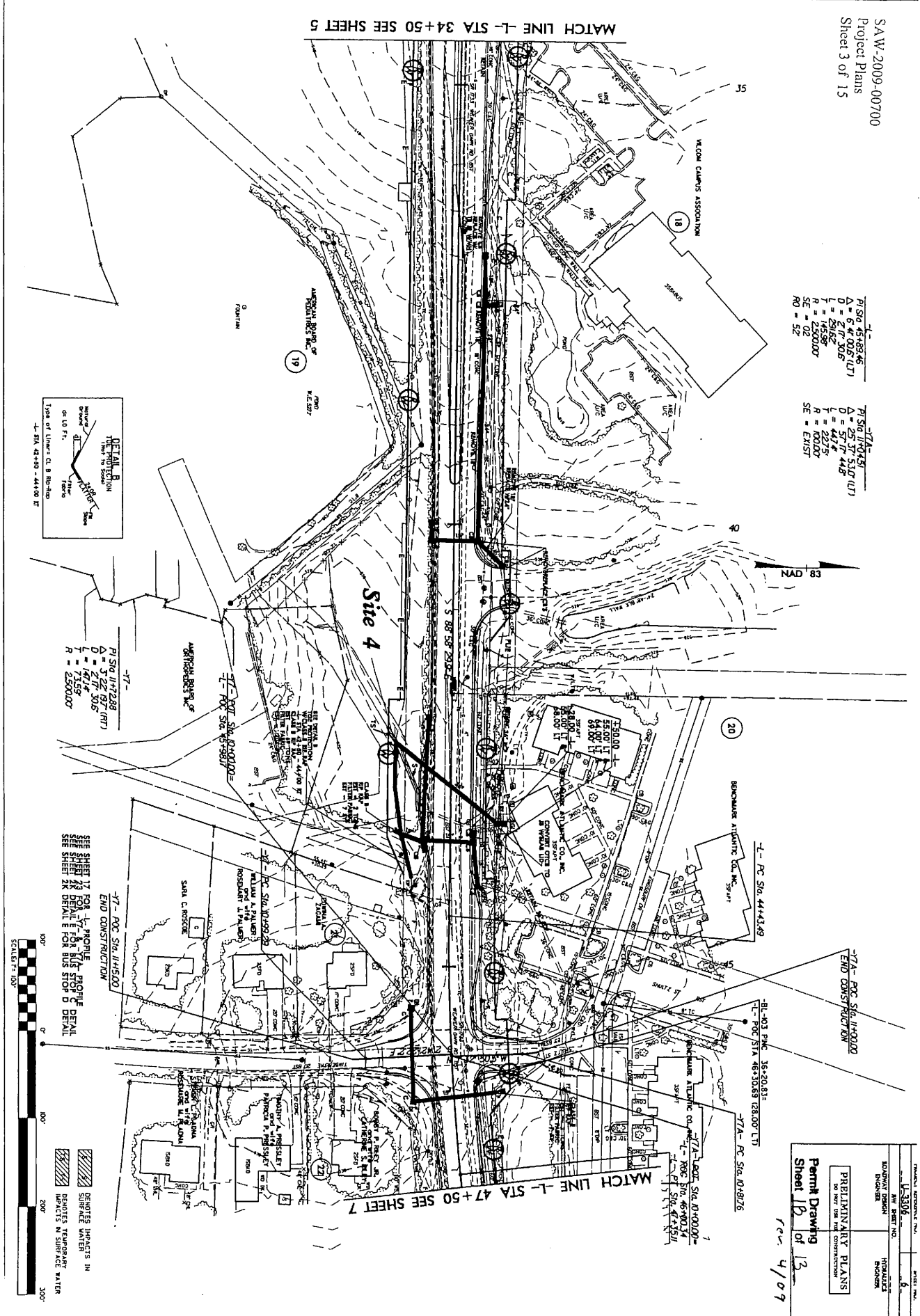
SA W-2009-00700  
Project Plans  
Sheet 3 of 15

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 $D = 25.37$   
 $L = 145.98$   
 $R = 2500.00$   
 $SE = 02$   
 $NO = 52$

$\Delta = 25.37$   
 $D = 25.37$   
 $L = 44.74$   
 $R = 1000.00$   
 $SE = EXIST$

REVISIONS  
 ROW REVISION 7/20/08 CL ADDED PUE'S TO PARCELS 18, 19 & 20. REMOVED TCE FROM PARCEL 18. REVISED TCE ON PARCEL 19 AND REVISED PDE & TCE ON PARCEL 20.

24-APR-2009 11:44  
 C:\highlights\permits\environmental\drawings\3386\jud\row\16.dwg



PROJECT NO.	6
DATE	8/17/9
DESIGNER	U-3308
DRAWN BY	U-3308
CHECKED BY	U-3308
APPROVED BY	U-3308
DATE	8/17/9
PROJECT NAME	SA W-2009-00700
SHEET NO.	6
TOTAL SHEETS	15
DATE	8/17/9
PROJECT NAME	SA W-2009-00700
SHEET NO.	6
TOTAL SHEETS	15
DATE	8/17/9

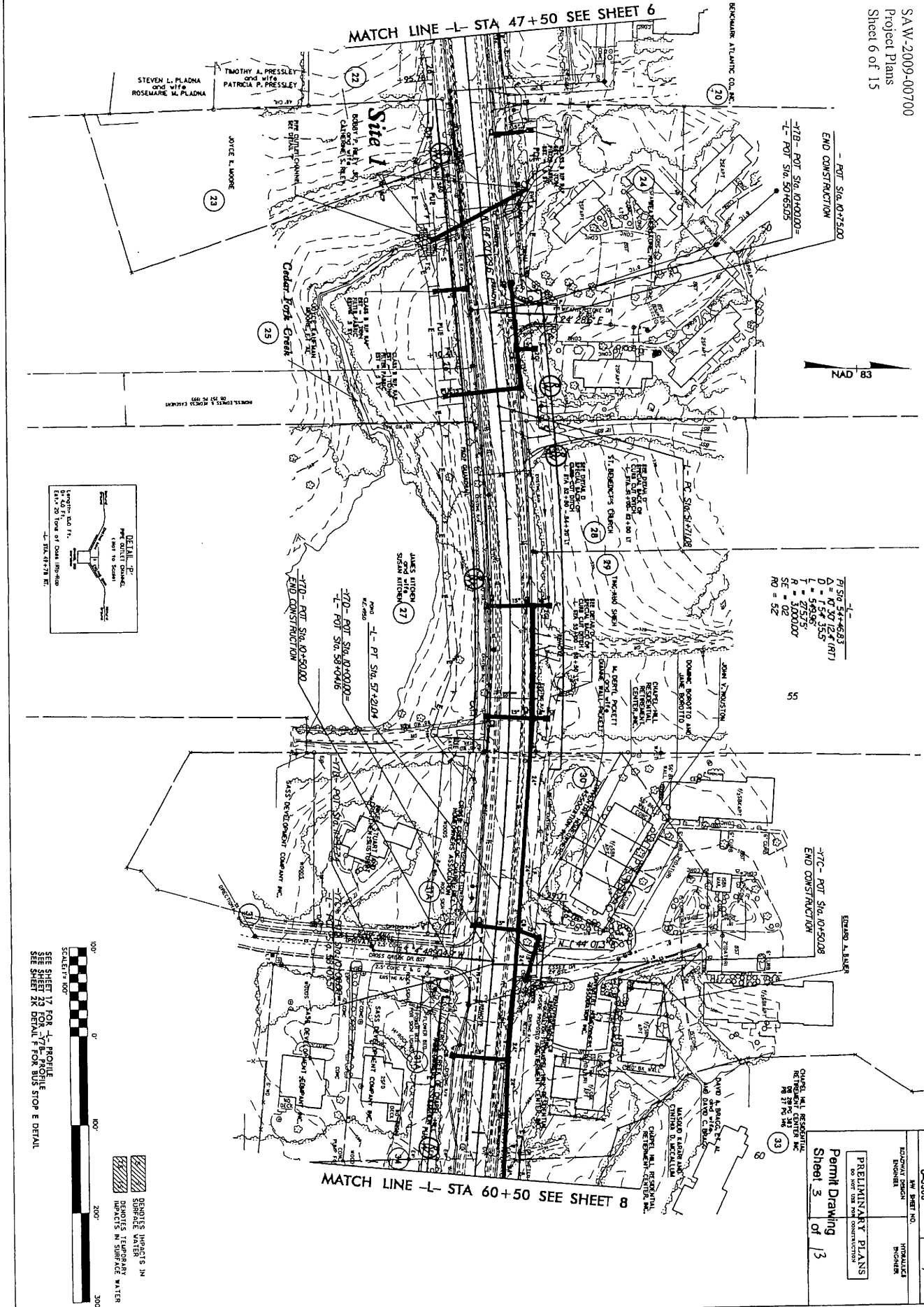
PRELIMINARY PLANS  
 SHEET 16 OF 15  
 rev 4/09





REVISIONS  
 ROW REVISION: 7/30/08 JCL ADDED PUE'S TO PARCELS 23,25,27 & 31A, REVISED TCE'S ON PARCELS 23,25,27 & 31A, AND REVISED PDE'S ON PARCEL 25.

06-NOV-2008 8:25  
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-PT STA. 0+75.00  
 END CONSTRUCTION  
 -7B- PT STA. 0+00.00=  
 L- POF STA. 50+55.95

71.50  
 5.00  
 307.24 (RT)  
 0 = 1.54 35.5  
 L = 54.96  
 T = 77.57  
 R = 300.00  
 SE = 52  
 RD = 52

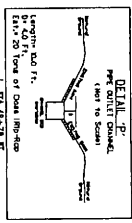
-7C- PT STA. 0+50.08  
 END CONSTRUCTION

CHADL M. RESIDENTIAL  
 2007-08-21  
 2007-08-21

PRELIMINARY PLANS  
 Permit Drawing  
 Sheet 3  
 of 13

MATCH LINE -L- STA 47+50 SEE SHEET 6

MATCH LINE -L- STA 60+50 SEE SHEET 8



RENTLES IMPACTS IN  
 SURFACE WATER  
 DOWNS IN SURFACE WATER

SEE SHEET 17 FOR 'L' PROFILE  
 SEE SHEET 29 FOR '7B' PROFILE  
 SEE SHEET 28 FOR 'BDS STOP E' DETAIL

NAD 83

U-3410  
 MW SHEET NO.  
 IRRIGATED  
 BROKEN

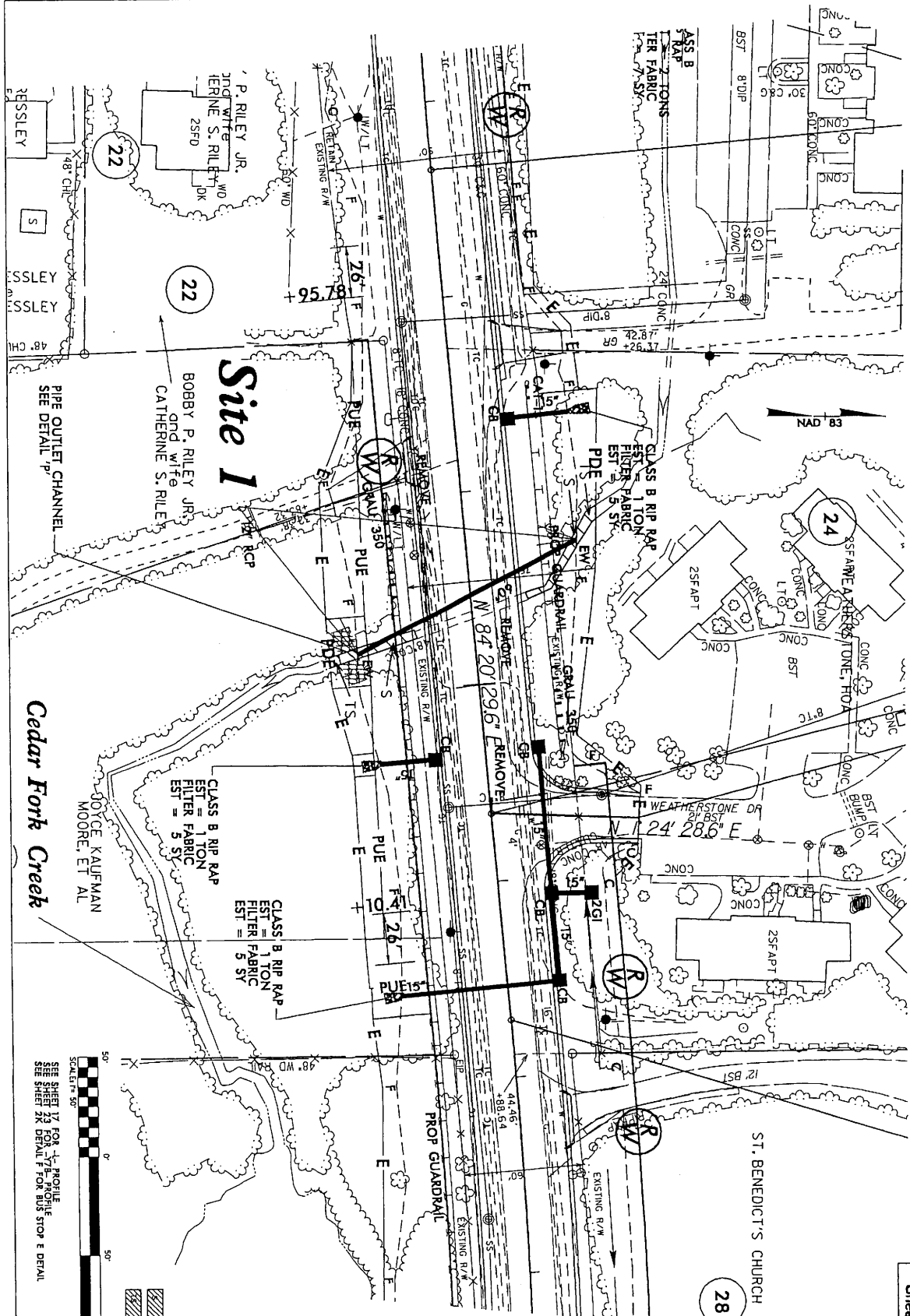


SA W-2009-00700  
 Project Plans  
 Sheet 7 of 15

# Site 1 Enlargement

REVISIONS  
 ROW REVISION, 7/30/08 JCL ADDED PUE'S TO PARCELS 23,25,27 & 31A REVISED TCE'S ON PARCELS 23,25,27 & 31A AND REVISED PDE'S ON PARCEL 25.

06-NOV-2008 10:28  
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 Alpacon AT 1/24/08



Cedar Fork Creek

ST. BENEDICT'S CHURCH



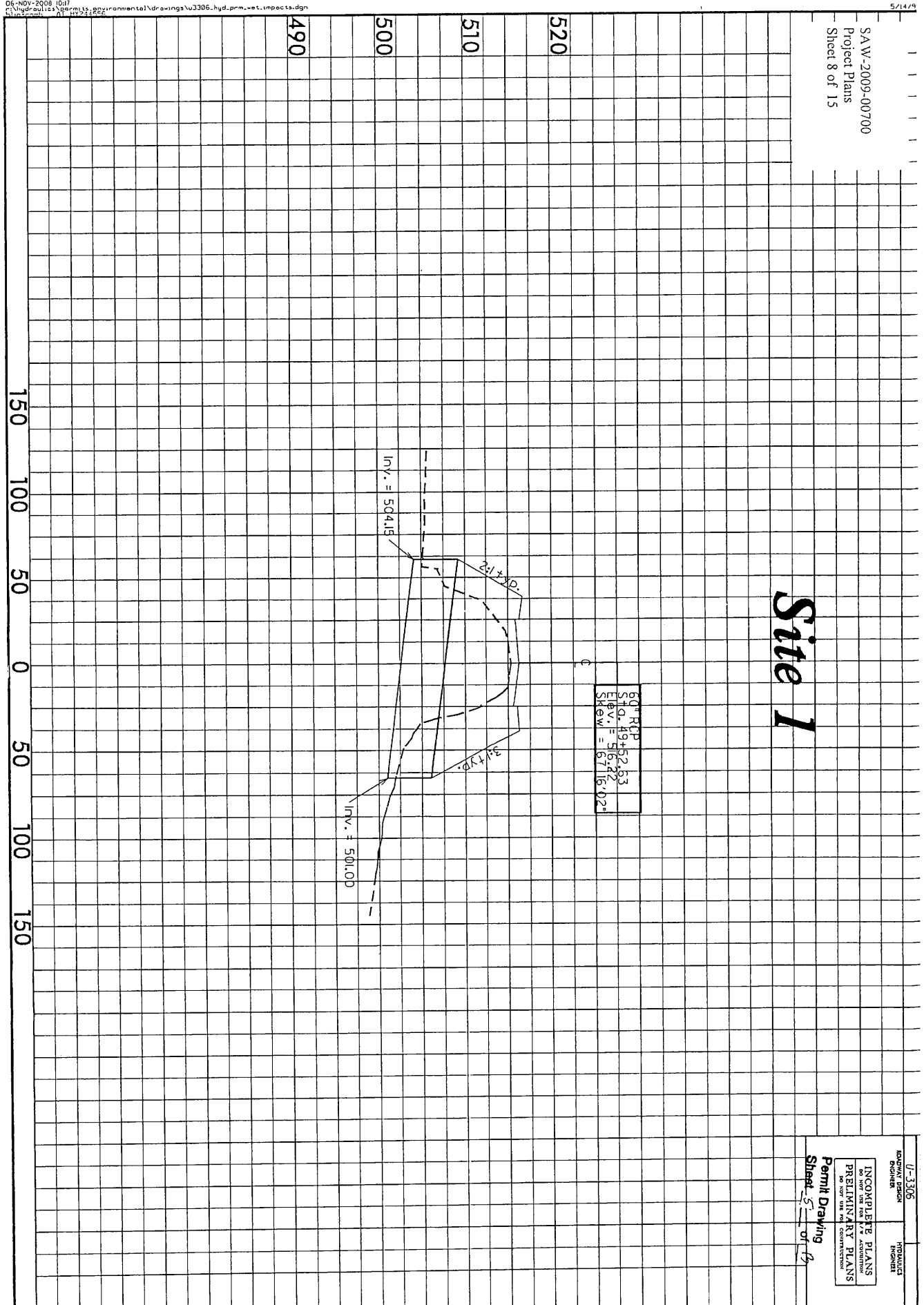
U-3306	7
DATE: 11/24/08	PROJECT: 3306
DESIGNER: JCL	PROJ. NO.: 3306
PRELIMINARY PLANS	
Permit Drawing	
Sheet 4	of 13

28



SAW-2009-00700  
 Project Plans  
 Sheet 8 of 15

# Site 1



05-NOV-2008 10:07  
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 User: lic\2306

U-3306  
 ROADWAY DESIGN  
 SHEET 8 OF 15

PROPOSED  
 IMPROVEMENTS

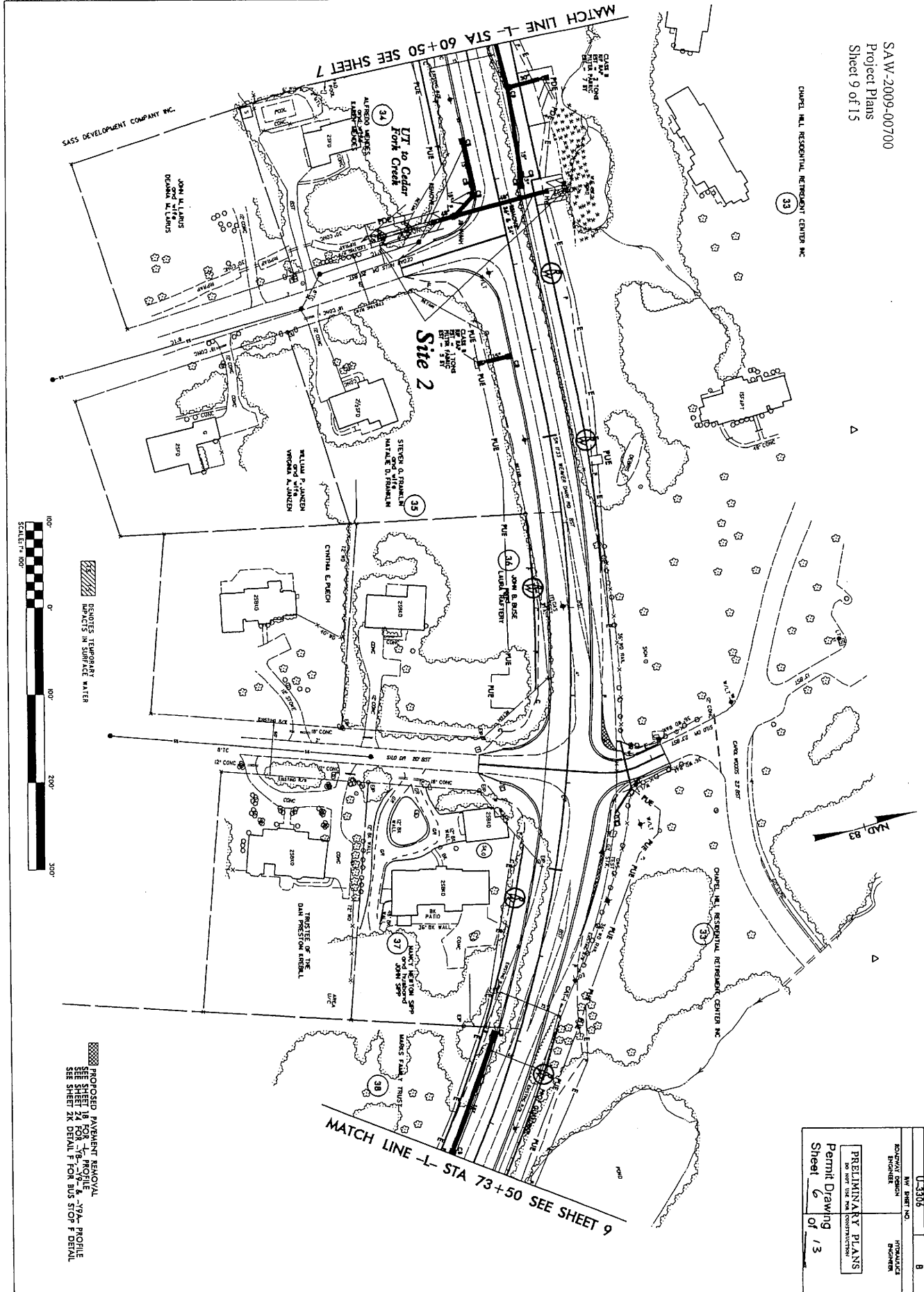
UNCORRECTED PLANS  
 PRELIMINARY PLANS  
 NO USE FOR PERMITS  
 NO USE FOR CONSTRUCTION

Permit Drawing  
 Sheet 8 of 15

CHAPEL HILL RESIDENTIAL RETIREMENT CENTER NC

REVISIONS  
 ROW REVISION: 7/30/08 JCL ADDED PUE'S ON PARCELS 33,34,35, & 36. REMOVED TCE'S ON PARCELS 34,35 & 36. REVISED TCE'S ON PARCEL 33.  
 & REVISED PDE ON PARCEL 35.

20-FEB-2009 08:45  
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INDICATES TEMPORARY WATER IMPACTS IN SURFACE WATER

PROPOSED PAVEMENT REMOVAL SEE SHEET 12 FOR PROFILE & -19'- PROFILE SEE SHEET 2K FOR BUS STOP F DETAIL

PROJECT NO.	U-3306	SHEET NO.	8
ENGINEER	HYDRA	DATE	02/20/09
PRELIMINARY PLANS	DO NOT USE FOR CONSTRUCTION		
Permit Drawing	of	13	



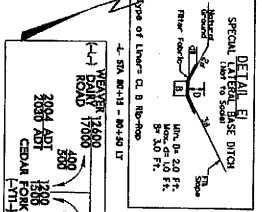
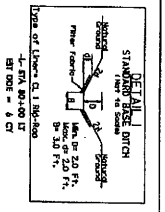
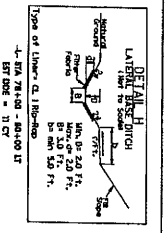
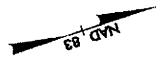
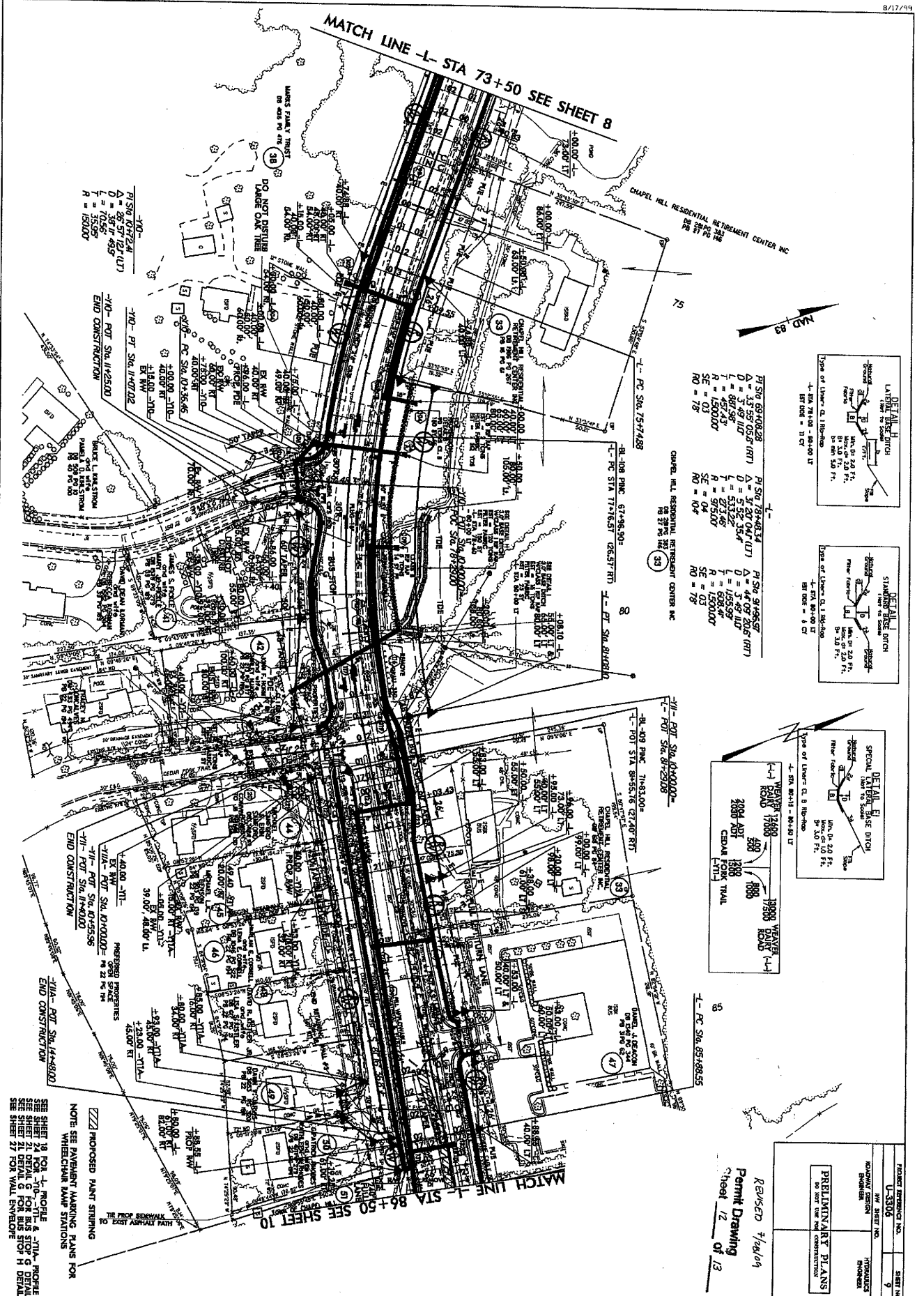












PI STA 69+408.28  
 Δ = 37.59 (0.5) (RT)  
 L = 887.98'  
 T = 457.43'  
 R = 1500.00'  
 SE = 03  
 NO = 78

PI STA 78+483.14  
 Δ = 37.20 (0.4) (LT)  
 L = 513.23 (3.4)  
 T = 273.46'  
 R = 975.00'  
 SE = 03  
 NO = 78

PI STA 94+96.57  
 Δ = 44.09 (2.0) (RT)  
 L = 574.57 (4.0)  
 T = 632.29'  
 R = 1500.00'  
 SE = 03  
 NO = 78

PI STA 114+480.00  
 Δ = 37.20 (0.4) (LT)  
 L = 513.23 (3.4)  
 T = 273.46'  
 R = 975.00'  
 SE = 03  
 NO = 78

PI STA 134+480.00  
 Δ = 37.20 (0.4) (LT)  
 L = 513.23 (3.4)  
 T = 273.46'  
 R = 975.00'  
 SE = 03  
 NO = 78

PROJECT REFERENCE NO.	U-3306	SHEET NO.	9
DATE	7/26/04	SCALE	
DESIGNER	PRELIMINARY PLANS	CHECKED	
DRAWN		IN CHARGE	
NO. OF SHEETS	12	NO. OF SHEETS USED FOR CONSTRUCTION	

REVISION 7/26/04  
 Permit Drawing  
 Sheet 12 of 13

SEE SHEET 18 FOR PROFILE  
 SEE SHEET 21 FOR DETAIL 5  
 SEE SHEET 21 FOR DETAIL 6  
 SEE SHEET 21 FOR DETAIL 7  
 SEE SHEET 21 FOR DETAIL 8  
 SEE SHEET 21 FOR DETAIL 9  
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