

STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION

JOSH STEIN
GOVERNOR

DANIEL H. JOHNSON
SECRETARY

October 10, 2025

MEMORANDUM TO: Becca Gallas, P.E.

Division 5 Engineer

FROM: Alan Shapiro, P.E.

NCTA Chief Engineer

Alan Shapiro

B149124683BD45D

SUBJECT: Triangle Expressway Southeast Extension (Complete 540) from NC

55 Bypass in Apex to US 64/264 (I-87) in Knightdale, Wake and Johnston Counties; Federal Aid No. STP-0540(19), STP-0540(20), and STP-0540(21); WBS Nos. 37673.1.TA1, 35516.1.TA1, and 35517.1.TA1; STIP Project Nos. R-2721, R-2828, and R-2829

DocuSigned by:

Attached are the modified US Army Corps of Engineers (USACE) Phased Section 404 Individual Permit, NC Division of Water Resources (NCDWR) Section 401 Individual Water Quality Certification, Neuse Riparian Buffer Authorization, and Non-404 Jurisdictional Wetlands and Waters Permit for the construction of the Triangle Expressway Southeast Extension (Complete 540) from NC 55 Bypass in Apex to US 64/264 (I-87) in Knightdale, Wake and Johnston Counties. STIP Nos. R-2721, R-2828, and R-2829. The changes are based on the September 30, 2025 revision submittal for the R-2829B section of the project related to several areas changing from one wetland impact type to another (e.g. mechanized clearing to excavation) or temporary stream impacts changing to permanent stream impacts for bank stabilization purposes. Also, additional impacts are needed for a ditch tie-in at Wetland WHG, which was removed during the 4B meeting, but is being added back in as a permit Site 13, additional excavation for diversion ditch (Site 24), and for an adjustment to mechanized clearing (Site 31). Subject to any requisite permit modifications, all environmental permits have been received for the construction of the final design sections of this project.

A copy of this permit package is posted on the NCDOT website at: https://xfer.services.ncdot.gov/pdea/PermIssued

cc: w/o attachment (see website for attachments)

Mr. Ron Davenport, P.E. Contracts Management

Mr. Clarence Coleman, P.E., FHWA

Mrs. Heather Montague, Division 5

Mr. Mark Craig, P.E., Division 5

Mr. Boyd Tharrington, P.E., Deputy Chief Engineer

Mr. Bill Martin, P.E., Programming and TIP

Mr. Timothy Ritacco, Utilities Unit

Mr. Matt Lauffer, P.E., Hydraulics Unit

Mr. David Snoke, P.E., Structures Management Unit

Mr. Mark Staley, Roadside Environmental

Mr. John Jamison, Environmental Policy Unit

Ms. Beth Harmon, NCDMS

Ms. Deanna Riffey, Natural Environment Unit-Environmental Coordination & Permitting

Mailing Address: NC DEPARTMENT OF TRANSPORTATION TURNPIKE AUTHORITY 1599 MAIL SERVICE CENTER RALEIGH, NC 27699-1599 Telephone: (919) 707-2700 Fax: (919) 715-5511 Customer Service: 1-877-368-4968 Location: 2501 AERIAL CENTER PARKWAY SUITE 200 MORRISVILLE, NC 27560

Website: www.ncdot.gov

404/401 Permits



DEPARTMENT OF THE ARMY

U.S. ARMY CORPS OF ENGINEERS, WILMINGTON DISTRICT RALEIGH FIELD OFFICE 3331 HERITAGE TRADE DRIVE SUITE 105 WAKE FOREST NC 27587

October 8, 2025

Regulatory Program

Alan Shapiro, P.E. Chief Engineer North Carolina Turnpike Authority 1599 Mail Service Center Raleigh, NC 27699-1599

Dear Mr. Shapiro:

Reference the Department of the Army permit issued to the North Carolina Department of Transportation (NCDOT) on October 24, 2019, and subsequently modified, to authorize the discharge of fill material into waters of the United States, for construction of the Triangle Expressway Southeast Extension (Complete 540) from NC 55 Bypass in Apex to US 64/264 (1-87) in Knightdale, Wake and Johnston Counties. Sections included within this permit are R-2721, R-2828, and R-2829.

Also, please reference your September 30, 2025 letter, requesting modification of the permit to authorize change of impacts at Permit Sites 13, 18, 24, 25, 31 and 32, for R-2829, Section B. The modifications are necessary due to minor measurement errors, ensuring fill and disturbed stream bank stability, in-field adjustments, and revised culvert construction sequencing. The modification requests the following impact changes:

Site 13

- Excavation in Wetland: 0.002 ac (previously 0)
- Mechanized Clearing in Wetland: 0.006 ac (previously 0)
- Total: 0.008 ac (previously 0) overall increase of 0.008 ac

Site 18

- Permanent Stream Impact (Bank Stabilization): 306 lf (previously 60) –
 Increase of 246 lf
- Temporary Stream Impact (Causeway): 73 lf (previously 285) Decrease of 212 lf
- Temporary Stream Impact (Dewatering): 36 If (previously 70) Decrease of 34 If

No additional impacts to streams or riparian buffers will occur at this location.

Site 24

- Excavation in Wetland: 0.039 ac (previously 0.028) Increase of 0.011 ac
- Mechanized Clearing in Wetland: 0.044 ac (previously 0.054) Decrease of 0.010 ac
- Total Mitigable Impacts: 0.440 ac (previously 0.439) overall Increase of

0.001 ac

Site 25

- Permanent Fill in Wetland: 0.209 ac (previously 0.207) Increase of 0.002
- Excavation in Wetland: 0.042 ac (previously 0.034) Increase of 0.008 ac
- Mechanized Clearing in Wetland: 0.156 ac (previously 0.166) Decrease of 0.010 ac
- Total Mitigable Impacts: 0.407 ac (previously 0.407) **Overall No Change**

Site 31

- Permanent Fill in Wetland: 0.615 ac (previously 0.612) Increase of 0.003 ac
- Mechanized Clearing in Wetland: 0.015 ac (previously 0.002) Increase of 0.013 ac
- Total Mitigable Impacts: 0.630 ac (previously 0.614) Increase of 0.016 ac

Site 32

- Permanent Fill in Wetland: 0.218 ac (previously 0.212) Increase of 0.006
- Excavation in Wetland: 0.048 ac (previously 0.040) Increase of 0.008 ac
- Mechanized Clearing in Wetland: 0.101 ac (previously 0.115) Decrease of 0.014 ac
- Total Mitigable Impacts: 0.367 ac (previously 0.367) No Change
- Permanent Stream Impact (Bank Stabilization): 195 If (previously 0)
- Temporary Stream Impact (Causeway): 74 If (previously 269)
- No Net Change

No additional stream impacts requiring mitigation are proposed. Additional permanent riparian wetland impacts requiring compensatory mitigation total 0.025 acre, and NCDOT has proposed to provide the compensatory mitigation through the Falling Creek mitigation bank site.

The Corps has completed the evaluation of your request and has determined that it is appropriate and reasonable, and that no public notice is required for this modification. Therefore, the permit is modified as requested and as shown on the enclosed R-2829B Mod Permit Drawings, Sheets 1, 5A, 5B, 5C, 40-44, 48, 60-64, 66, 68-70, 73, 76-81, 83-84, and 110-111 of 112, submitted September 30, 2025.

Additional compensatory mitigation of 0.050 acre wetland credits, is required, in accordance with the provisions outlined on the attached Compensatory Mitigation Responsibility Transfer Form.

The special conditions for the permit are also enclosed, and have not changed from the revised Special Conditions provided with the December 13, 2024 modification. The revised permit expiration date remains December 31, 2029.

Should you have any questions, contact Mr. Eric Alsmeyer, via email at Eric.C.Alsmeyer@usace.army.mil or by telephone at (919) 817-1570. Please take a moment to complete our customer satisfaction survey located at https://regulatory.ops.usace.army.mil/customer-service-survey/.

Sincerely,

M. Scott Jones, PWS

WRDA / Transportation Branch Chief

USACE Wilmington District

Enclosures

cc: Jennifer Harris, NC Turnpike Authority (via ext-jhharris1@ncdot.gov)
Deanna Riffey, NCDOT (via driffey@ncdot.gov)

Revised SPECIAL CONDITIONS

Action ID SAW-2009-02240; Complete 540; TIPS R-2721, R-2828, and R-2829

Note: Special Condition 9 was modified on October 28, 2024, and Special Condition 30 was added on December 12, 2024.

- 1. **Work Limits:** All work authorized by this permit shall be performed in strict compliance with the attached permit plans submitted on September 12, 2018, and revised on February 8, 2019, which are a part of this permit. The Permittee shall ensure that the construction design plans for this project do not deviate from the permit plans attached to this authorization. Any modification to the attached permit plans must be approved by the U.S. Army Corps of Engineers (Corps) prior to any active construction in waters or wetlands.
- 2. **Unauthorized Dredge and/or Fill:** Except as authorized by this permit or any U.S. Army Corps of Engineers 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, or shall any activities take place that cause the degradation of waters or wetlands. There shall be no excavation from, waste disposal into, or degradation of, jurisdictional wetlands or waters associated with this permit without appropriate modification of this permit, including appropriate compensatory mitigation. This prohibition applies to all borrow and waste activities connected with this project. In addition, 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, into, or out of waters or wetlands or to reduce the reach of waters or wetlands.
- 3. **Permit Distribution:** 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 and drawings shall be available at the project site during construction and maintenance of this project.
- 4. **Preconstruction Meeting:** The Permittee shall conduct an onsite preconstruction meeting between its representatives, the contractor's representatives and the appropriate U.S. Army Corps of Engineers Project Manager prior to undertaking any work within jurisdictional waters and wetlands to ensure that there is a mutual understanding of all terms and conditions contained within the Department of the Army permit. The Permittee shall schedule the preconstruction meeting for a time frame when the Corps, and NCDWR Project Managers can attend. The Permittee shall invite the Corps, and NCDWR 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. The thirty (30) day requirement can be waived with the concurrence of the Corps.

- 5. **Notification of Construction Commencement and Completion:** The Permittee shall notify the U.S. Army Corps of Engineers in writing prior to beginning the work authorized by this permit and again upon completion of the work authorized by this permit.
- 6. **Reporting Address:** All reports, documentation, and correspondence required by the conditions of this permit shall be submitted to the following: U.S. Army Corps of Engineers, Wilmington District Raleigh Regulatory Field Office, Attn: Eric Alsmeyer, 3331 Heritage Trade Drive, Suite 105, Wake Forest, NC 27587, or eric.c.alsmeyer@usace.army.mil. The Permittee shall reference the following permit number, SAW-2009-02240, on all submittals.
- 7. **Permit Revocation:** 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.
- 8. **Reporting Violations:** Violation of these permit conditions or violation of Section 404 of the Clean Water Act or Section 10 of the Rivers and Harbors Act shall be reported to the Corps in writing and by telephone at: 919.554.4884, extension 23, within 24 hours of the Permittee's discovery of the violation.

9. Endangered Species

- 1) The Permittee shall implement all necessary measures to ensure the authorized activity does not kill, injure, capture, harass, or otherwise harm any federally-listed threatened or endangered species, except as authorized by the October 15, 2019 US Fish and Wildlife Service BIOLOGICAL/CONFERENCE OPINION, as modified by the September 30, 2024 ADDENDUM. While accomplishing the authorized work, if the Permittee discovers or observes an injured or dead threatened or endangered species, the U.S. Army Corps of Engineers, Wilmington District Raleigh Field Office, telephone 919.554.4884, extension 23, email to eric.c.alsmeyer@usace.army.mil will be immediately notified to initiate the required Federal coordination.
- **2) Atlantic Sturgeon:** In order to protect the federally-listed Atlantic sturgeon, no temporary causeways or work bridges will block more than 50% of the Neuse River below its ordinary high water mark, and will be removed at the end of the project's construction.

- 3) DWM Biological Opinion: This Department of the Army permit does not authorize you to take an endangered species, in particular the Dwarf wedgemussel, Alasmidonta heterodon. In order to legally take a listed species, you must have separate authorization under the Endangered Species Act (ESA) (e.g., an ESA Section 10 permit, or a BO under ESA Section 7, with "incidental take" provisions with which you must comply). The attached October 15, 2019 US Fish and Wildlife Service BIOLOGICAL/CONFERENCE OPINION, as modified by the September 30, 2024 ADDENDUM (B/CO-A), contains mandatory terms and conditions to implement the reasonable and prudent measures that are associated with "incidental take" that is also specified in the B/CO-A. Your authorization under this permit is conditional upon your compliance with all of the mandatory terms and conditions associated with incidental take of the attached B/CO-A, which terms and conditions are incorporated by reference in this permit. Failure to comply with the terms and conditions associated with incidental take of the BO, where a take of the listed species occurs, would constitute an unauthorized take, and it would also constitute non-compliance with your permit. The U.S. Fish and Wildlife Service is the appropriate authority to determine compliance with the terms and conditions of its B/CO-A, and with the ESA.
- 4) NLEB Programmatic Biological Opinion: 11. The Wilmington District, Federal Highway Administration, U.S. Fish and Wildlife Service (USFWS), and the North Carolina Department of Transportation (NCDOT) have conducted programmatic Section 7(a)(2) consultation for the Northern long-eared bat (NLEB) for NCDOT projects located in Divisions 1-8. The result of this programmatic consultation is a Programmatic Biological Opinion (PBO) issued by the USFWS titled, "Programmatic Biological Opinion - Revised, NCDOT Program Effects on the Northern Long-eared Bat in Divisions 1-8", dated December 15, 2022. This PBO contains agreed upon conservation measures which would minimize take of NLEB. As noted in the PBO, applicability of these conservation measures varies depending on the location of the project. The USFWS has documented that no reasonable and prudent measures, nor terms and conditions, are necessary or appropriate to minimize the amount or extent of incidental take of NLEB caused by the Action; therefore, the incidental take statement does not provide reasonable and prudent measures for this species. Department of the Army (DA) authorization under general permit or standard permit (Individual Permit) is conditional upon the permittee's compliance with applicable, agreed upon conservations measures of the PBO, which is incorporated by reference in this permit. Failure to comply with the applicable conservation measures, where a take of the NLEB occurs, would constitute an unauthorized take by the permittee, and would also constitute permittee noncompliance with this permit. The USFWS is the appropriate authority to determine compliance with the terms and conditions of its PBO and the ESA. All PBOs can be found on our website at:

https://www.saw.usace.army.mil/Missions/Regulatory-Permit-Program/Agency-Coordination/ESA/.

5) TCB Programmatic Biological Opinion: The U.S. Fish and Wildlife Service's (USFWS's) Programmatic Conference Opinion (PCO) titled "NCDOT Program Effects on the Tricolored Bat in Divisions 1-8", dated November 20, 2023, contains

mandatory terms and conditions to implement the reasonable and prudent measures that are associated with "incidental take" that are specified in the PCO. Your authorization under this Corps permit is conditional upon your compliance with all the mandatory terms and conditions associated with incidental take of the PCO, which terms and conditions are incorporated by reference in this permit. Failure to comply with the terms and conditions associated with incidental take of the PCO, where a take of the listed species occurs, would constitute an unauthorized take, and it would also constitute non-compliance with your Corps permit. The USFWS is the appropriate authority to determine compliance with the terms and conditions of its PCO, and with the ESA.

10. **Maintain Flows and Circulation Patterns of Waters:** 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 and/or wetlands.

11. Sediment and Erosion Control:

- 1) During the clearing phase of the project, heavy equipment shall not be operated in surface waters or stream channels. Temporary stream crossings will be used to access the opposite sides of stream channels. All temporary diversion channels and stream crossings will be constructed of non-erodible materials. Grubbing of riparian vegetation will not occur until immediately before construction begins on a given segment of stream channel.
- 2) No fill or excavation impacts for the purposes of sedimentation and erosion control shall occur within jurisdictional waters, including wetlands, unless the impacts are included on the plan drawings and specifically authorized by this permit. This includes, but is not limited to, sediment control fences and other barriers intended to catch sediment losses.
- 3) The Permittee shall remove all sediment and erosion control measures placed in waters and/or wetlands, and shall restore natural grades on those areas, prior to project completion.
- 4) The Permittee shall use appropriate sediment and erosion control practices which equal or exceed those outlined in the most recent version of the "North Carolina Sediment and Erosion Control Planning and Design Manual" to ensure compliance with the appropriate turbidity water quality standard. Erosion and sediment control practices shall be in full compliance with all specifications governing the proper design, installation and operation and maintenance of such Best Management Practices in order to ensure compliance with the appropriate turbidity water quality standards. 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 shall remain in full compliance with all aspects of the Sedimentation Pollution Control Act of 1973 (North Carolina General Statutes Chapter 113A Article 4). Adequate sedimentation and erosion control measures shall be implemented prior to any ground disturbing activities to minimize impacts to downstream aquatic resources. These measures shall be inspected and maintained regularly, especially following rainfall events. All fill material shall be adequately stabilized at the earliest practicable date to prevent sediment from entering into adjacent waters or wetlands.

- 12. **Clean Fill:** The Permittee shall use only clean fill material for this project. The fill material shall be free of items such as trash, construction debris, metal and plastic products, and concrete block with exposed metal reinforcement bars. Soils used for fill shall not be contaminated with any toxic substance in concentrations governed by Section 307 of the Clean Water Act. Unless otherwise authorized by this permit, all fill material placed in waters or wetlands shall be generated from an upland source.
- 13. **Water Contamination:** All mechanized equipment shall 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) 733-3300 or (800) 858-0368 and provisions of the North Carolina Oil Pollution and Hazardous Substances Control Act shall be followed.

ANADROMOUS FISH / AQUATIC LIFE

- 14. **Aquatic Life Movement:** No activity may substantially disrupt the necessary life cycle movements of those species of aquatic life indigenous to the waterbody, including those species that normally migrate through the area. All discharges of dredged or fill material within waters of the United States shall be designed and constructed to maintain low flows to sustain the movement of aquatic species.
- 15. **Prohibitions on Concrete:** The Permittee shall take measures necessary to prevent live or fresh concrete, including bags of uncured concrete, from coming into contact with any water in or entering into waters of the United States. Water inside coffer dams or casings that has been in contact with concrete shall only be returned to waters of the United States when it no longer poses a threat to aquatic organisms (concrete is set and cured).

COMPENSATORY MITIGATION

16. In order to compensate for impacts associated with this permit, mitigation shall be provided in accordance with the provisions outlined on the most recent version of the attached Compensatory Mitigation Responsibility Transfer Form. The requirements of this form, including any special conditions listed on this form, are hereby incorporated as special conditions of this permit.

CULTURAL RESOURCES

17. Historic Properties (MOA): The Permittee shall fully implement the Memorandum of Agreement between the Permittee, the North Carolina State Historic Preservation Officer and the U.S. Army Corps of Engineers, Wilmington District, dated last signed 3/11/2018, which is incorporated herein by reference.

CULVERTS

- **18.** Unless otherwise requested in the application and depicted on the approved permit plans, culverts greater than 48 inches in diameter shall be buried at least one foot below the bed of the stream. Culverts 48 inches in diameter and less shall be buried or placed on the stream bed as practicable and appropriate to maintain aquatic passage, and every effort shall be made to maintain existing channel slope. The bottom of the culvert shall be placed at a depth below the natural stream bottom to provide for passage during drought or low flow conditions. Culverts shall be designed and constructed in a manner that minimizes destabilization and head cutting.
- 19. Measures shall be included in the culvert construction/installation that will promote the safe passage of fish and other aquatic organisms. The dimension, pattern, and profile of the stream above and below a culvert or pipe shall not be modified by widening the stream channel or by reducing the depth of the stream in connection with the construction activity. The width, height, and gradient of a proposed opening shall be such as to pass the average historical low flow and spring flow without adversely altering flow velocity. Spring flow should be determined from gauge data, if available. In the absence of such data, bankfull flow can be used as a comparable level.
- **20.** The Permittee shall implement all reasonable and practicable measures to ensure that equipment, structures, fill pads, work, and operations associated with this project do not adversely affect upstream and/or downstream reaches. Adverse effects include, but are not limited to, channel instability, flooding, and/or stream bank erosion. The Permittee shall routinely monitor for these effects, cease all work when detected, take initial corrective measures to correct actively eroding areas, and notify this office immediately. Permanent corrective measures may require additional authorization by the U.S. Army Corps of Engineers.
- **21.** Culverts placed within wetlands must be installed in a manner that does not restrict the flows and circulation patterns of waters of the United States. Culverts placed across wetland fills purely for the purposes of equalizing surface water shall not be buried, but the culverts must be of adequate size and/or number to ensure unrestricted transmission of water.

PONDS

22. Sediment Sluicing: The release of sediments from ponds (sluicing) is not authorized by this permit. The Permittee shall take all measures necessary to control any bottom

sediments that may be sluiced during the drainage of pond(s) on the project site.

UTILITY LINES

- 23. Temporary Impacts Restoration Measures: Within thirty (30) days of the date of completing the authorized work, the Permittee shall remove all temporary fills in waters of the United States and restore the affected areas to pre-construction contours and elevations. The affected areas shall be re-vegetated with native, non-invasive vegetation as necessary to minimize erosion and ensure site stability. In wetland areas where pipeline installation via trenching is authorized, wetland topsoil shall be segregated from the underlying subsoil, and the top 6 to 12 inches of the trench shall be backfilled with topsoil from the trench.
- **24.** Cleared wetland areas shall be re-vegetated with a wetland seed mix or a mix of native woody species. Fescue grass or any invasive species such as *Lespedeza* spp., shall not be used within the wetland areas.
- **25.** Prior to construction within any jurisdictional areas, the Permittee shall correctly install silt fencing (with or without safety fencing) parallel with the utility line corridor, on both sides of the jurisdictional crossing. This barrier is to serve both as an erosion control measure and a visual identifier of the limits of construction within any jurisdictional area. The Permittee shall maintain the fencing, at minimum, until the wetlands have re-vegetated and stabilized.
- **26. Hydraulic Fracturing (Fracking):** When directional boring or horizontal directional drilling (HDD) under waters of the United States, including wetlands, the Permittee shall closely monitor the project for hydraulic fracturing or "fracking" and material from the drilling operation leaching to the surface and into jurisdictional areas. Any discharge from fracking or leaching into waters of the United States, including wetlands, shall be reported to U.S. Army Corps of Engineers, Wilmington District Raleigh Field Office, telephone 919.554.4884, extension 23, email to eric.c.alsmeyer@usace.army.mil within 48 hours. Restoration and/or mitigation may be required as a result of any unintended discharges.

NCDOT STANDARD PERMIT CONDITIONS

- **27. Phased Permit and Mitigation:** This permit only authorizes work on Sections A and B of TIP R-2721. Construction on Sections of TIP, R-2828 and R-2829 shall not commence until all the following occur:
- (a) final design has been completed for those sections and submitted to the U.S. Army Corps of Engineers (Corps); (b) the Permittee has minimized impacts to waters and wetlands to the maximum extent practicable and the Corps concurs with this assessment through standard Merger 4B and 4C meetings; (c) any modification to the plans have been approved by the Corps in writing; and (d) a final compensatory mitigation plan for the relevant TIP project has been submitted by the Permittee and approved by the Corps.

- 28. **Temporary Fills:** Within thirty (30) days of the date of completing the authorized work, the Permittee shall remove all temporary fills in waters of the United States and restore the affected areas to pre-construction contours and elevations. The affected areas shall be re-vegetated with native, non-invasive vegetation as necessary to minimize erosion and ensure site stability.
- 29. Borrow and Waste: To ensure that all borrow and waste activities occur on high ground and do not result in the degradation of adjacent waters and wetlands, except as authorized by this permit, the Permittee shall require its contractors and/or agents to identify all areas to be used as borrow and/or waste sites associated with this project. The Permittee shall provide the U.S. Army Corps of Engineers with appropriate maps indicating the locations of proposed borrow and/or waste sites as soon as such information is available. The Permittee shall submit to the Corps site-specific information needed to ensure that borrow and/or waste sites comply with all applicable Federal requirements, to include compliance with the Endangered Species Act and the National Historic Preservation Act, such as surveys or correspondence with agencies (e.g., the USFWS, the NC-HPO, etc.). The required information shall also include the location of all aquatic features, if any, out to a distance of 400 feet beyond the nearest boundary of the site. The Permittee shall not approve any borrow and/or waste sites before receiving written confirmation from the Corps that the proposed site meets all Federal requirements, whether or not waters of the U.S., including wetlands, are located in the proposed borrow and/or waste site. All delineations of aquatic sites on borrow and/or waste sites shall be verified by the U.S. Army Corps of Engineers and shown on the approved reclamation plans. The Permittee shall ensure that all borrow and/or waste sites comply with Special Condition 2 of this permit. Additionally, the Permittee shall produce and maintain documentation of all borrow and waste sites associated with this project. This documentation will include data regarding soils, vegetation, hydrology, any delineation(s) of aquatic sites, and any jurisdictional determinations made by the Corps to clearly demonstrate compliance with Special Condition 2. All information will be available to the U.S. Army Corps of Engineers upon request. The Permittee shall require its contractors to complete and execute reclamation plans for each borrow and/ or waste site and provide written documentation that the reclamation plans have been implemented and all work is completed. This documentation will be provided to the U.S. Army Corps of Engineers within 30 days of the completion of the reclamation work.
- 30. **Boater Safety Plan:** The permittee shall implement the *NEUSE RIVER & NEUSE RIVER GREENWAY TRAIL USER SAFETY PLAN*, attached, submitted 9/16/2024, which would mitigate the impacts to personal watercraft use of this portion of the Neuse River by providing safety signage, buoys, ring buoys, and designated portage routes during construction of bridge spans over the Neuse.

JOSH STEIN
Governor
D. REID WILSON
Secretary
RICHARD E. ROGERS, JR.
Director



October 2, 2025

Alan Shapiro, P.E., Chief Engineer North Carolina Turnpike Authority 1578 Mail Service Center Raleigh, NC 27699 awshapiro@ncdot.gov

Subject: MODIFICATION of 401 Water Quality Certification Pursuant to Section 401 of the Federal Clean Water

Act with ADDITIONAL CONDITIONS for Proposed construction of the Triangle Expressway Southeast Extension (NC 540) in Wake & Johnston Counties, Federal Aid Project No. 050047, State Project No.

35517.3.TA1, TIP Nos, R-2721, R-2828, & R-2829. (TIP R-2829B for This Modification)

NCDWR Project No. 20181249 version 24.

Dear Mr. Shapiro:

Attached hereto is a copy of Modification to Certification No. 4179 issued to The North Carolina Department of Transportation (NCDOT), Turnpike Authority, originally dated February 15, 2019 and most recent modification dated October 2, 2025

This approval is for the purpose and design described in your application. The plans and specifications for this project are incorporated by reference as part of this Water Quality Certification. If you change your project, you must notify the Division and you may be required to submit a new application package with the appropriate fee. If the property is sold, the new owner must be given a copy of this Certification and is responsible for complying with all conditions. [15A NCAC 02H .0507(d)(2)]. This Certification does not relieve the permittee of the responsibility to obtain all other required Federal, State, or Local approvals before proceeding with the project, including those required by, but not limited to, Sediment and Erosion Control, Non-Discharge, and Water Supply Watershed regulations.

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

Sincerely,

Signed by:
Faith Hardin
3185423002EA45E...

Faith Hardin, Supervisor 401 & Buffer Transportation Permitting Branch

Attachments

Cc: Eric Alsmeyer, US Corps of Engineers, Raleigh Field Office (Eric.C.Alsmeyer@usace.army.mil) Jennifer Harris, PE, NC Turnpike Authority (ext-jharris1@ncdot.gov) Deanna Riffey, NCDOT Environmental Analysis (driffey@ncdot.gov) Camden M. Brunick, Wildlands Engineering Inc (cbrunick@wildlandseng.com) File Copy



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

THIS MODIFIED 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 Resources (NCDWR) Regulations in 15 NCAC 2H .0500. This certification modification authorizes the NC Turnpike Authority to impact 8.798 acres of jurisdictional wetlands and 10517 linear feet of jurisdictional streams in Wake County for section **R-2829B** of the Complete 540 project. The project shall be constructed pursuant to the modification application received October 1, 2025. The authorized additional impacts for this modification are as described below:

Modified R-2829B Stream Impacts in the Neuse River Basin

Site	Riprap Stabilization to Perennial Stream (linear ft)	Temporary Impact to Perennial Stream (linear ft)
18	306 (Previously 60. Increase of 246.)	109 (Previously 355. Decrease of 246.)
32	195 (Previously 0. Increase of 195.)	74 (Previously 269. Decrease of 195.)

Total Stream Net Revision for R-2829B: +441 linear feet Streambank Stabilization.
-441 linear feet Temporary Impact.
Total net change +/- 0 linear feet streams.

Modified R-2829B Wetland Impacts in the Neuse River Basin

Site	Permanent Fill (ac)	Excavation (ac)	Mechanized Clearing (ac)
13	0	0.002 (Previously 0; Increase of 0.002)	0.006 (Previously 0; Increase of 0.006)
24	0.357 (No change)	0.039 (Previously 0.028; Increase of 0.011)	0.044 (Previously 0.054; Decrease of 0.010)
25	1.441 (Previously 1.439; Increase of 0.002)	0.081 (Previously 0.073; Increase of 0.008)	0.258 (Previously 0.268; Decrease of 0.010)
31	0.615 (Previously 0.612; Increase of 0.003)	(No change)	0.015 (Previously 0.002; Increase of 0.013)
32	1.010 (Previously 1.004; Increase of 0.006)	0.179 (Previously 0.171; Increase of 0.008)	0.593 (Previously 0.607; Decrease of 0.014)

Total Stream net Revision for R-2829B: +0.011 ac Permanent Fill +0.029 ac Excavation

-0.015 ac Mechanized Clearing

Total net change: +0.025 ac Mitigable wetland impact.



The application provides adequate assurance that the discharge of fill material into the waters of the Neuse 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 modification application received November 14, 2024. Should your project change, you are required to notify the NCDWR 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.

This Water Quality Certification neither grants nor affirms any property right, license, or privilege in any lands or waters, or any right of use in any waters. This Water Quality Certification does not authorize any person to interfere with the riparian rights, littoral rights, or water use rights of any other person and does not create any prescriptive right or any right of priority regarding any usage of water. This Water Quality Certification shall not be interposed as a defense in any action respecting the determination of riparian or littoral rights or other rights to water use. No consumptive user is deemed by virtue of this Water Quality Certification to possess any prescriptive or other right of priority with respect to any other consumptive user regardless of the quantity of the withdrawal or the date on which the withdrawal was initiated or expanded. Upon the presentation of proper credentials, the Division may inspect the property.

Condition of Certification:

1. Additional mitigation must be provided for the proposed impacts as specified in the table below. The attached Compensatory Mitigation Responsibility Acceptance Form (Form) shall be completed and provided to the Division prior to impacts occurring. If the Mitigation Provider specified on the attached Form(s) for the proposed impacts changes after issuance of this Certificate, then the Permittee shall request a revised Compensatory Mitigation Responsibility Acceptance Form from the Division prior to conducting any impacts. If multiple mitigation banks are used for this project, it is the responsibility of the permittee to verify that the credits from the various banks add up to an amount equal to or greater than the amount required in this certification.

	Compensatory Mitigation Required	River Basin & HUC Number
Wetland	+ 0.025 acres (credits)	Neuse River Basin
		03020201 HUC

Citation: 15A NCAC 02H .0506(c); 15A NCAC 02H .0507(c)

2. All other conditions in the Water Quality Certification for this project dated December 10, 2024, and all previous versions thereof, are still applicable to this approval.

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. Please be aware that impacting waters without first applying for and securing the issuance of a 401 Water Quality Certification violates Title 15A of the North Carolina Administrative Code (NCAC) 2H .0500. Title 15A NCAC 2H .0500 requires certifications pursuant to Section 401 of the Clean Water Act whenever construction



or operation of facilities will result in a discharge into navigable waters, including wetlands, as described in 33 Code of Federal Regulations (CFR) Part 323. It also states any person desiring issuance of the State certification or coverage under a general certification required by Section 401 of the Federal Water Pollution Control Act shall file with the Director of the North Carolina Division of Water Quality. Violations of any condition herein set forth may result in revocation of this Certification and may result in criminal and/or civil penalties. Pursuant to G.S. 143-215.6A, these violations and any future violations are subject to a civil penalty assessment of up to a maximum of \$25,000.00 per day for each violation.

This approval and its conditions are final and binding unless contested [G.S. 143-215.5]. Please be aware that impacting waters without first applying for and securing the issuance of a 401 Water Quality Certification violates Title 15A of the North Carolina Administrative Code (NCAC) 2H .0500. Title 15A NCAC 2H .0500 requires certifications pursuant to Section 401 of the Clean Water Act whenever construction or operation of facilities will result in a discharge into navigable waters, including wetlands, as described in 33 Code of Federal Regulations (CFR) Part 323. It also states any person desiring issuance of the State certification or coverage under a general certification required by Section 401 of the Federal Water Pollution Control Act shall file with the Director of the North Carolina Division of Water Quality. Pursuant to G.S. 143-215.6A, these violations and any future violations are subject to a civil penalty assessment of up to a maximum of \$25,000.00 per day for each violation.

This Certification can be contested as provided in Chapter 150B of the North Carolina General Statutes by filing a Petition for a Contested Case Hearing (Petition) with the North Carolina Office of Administrative Hearings (OAH) within sixty (60) calendar days. Requirements for filing a Petition are set forth in Chapter 150B of the North Carolina General Statutes and Title 26 of the North Carolina Administrative Code. Additional information regarding requirements for filing a Petition and Petition forms may be accessed at http://www.ncoah.com/ or by calling the OAH Clerk's Office at (919) 431-3000.

A party filing a Petition must serve a copy of the Petition on: Dan Hirschman, General Counsel Department of Environmental Quality 1601 Mail Service Center Raleigh, NC 27699-1601

If the party filing the Petition is not the permittee, then the party must also serve the recipient of the Certification in accordance with N.C.G.S 150B-23(a).

This the 2nd day of October 2025

DIVISION OF WATER RESOURCES

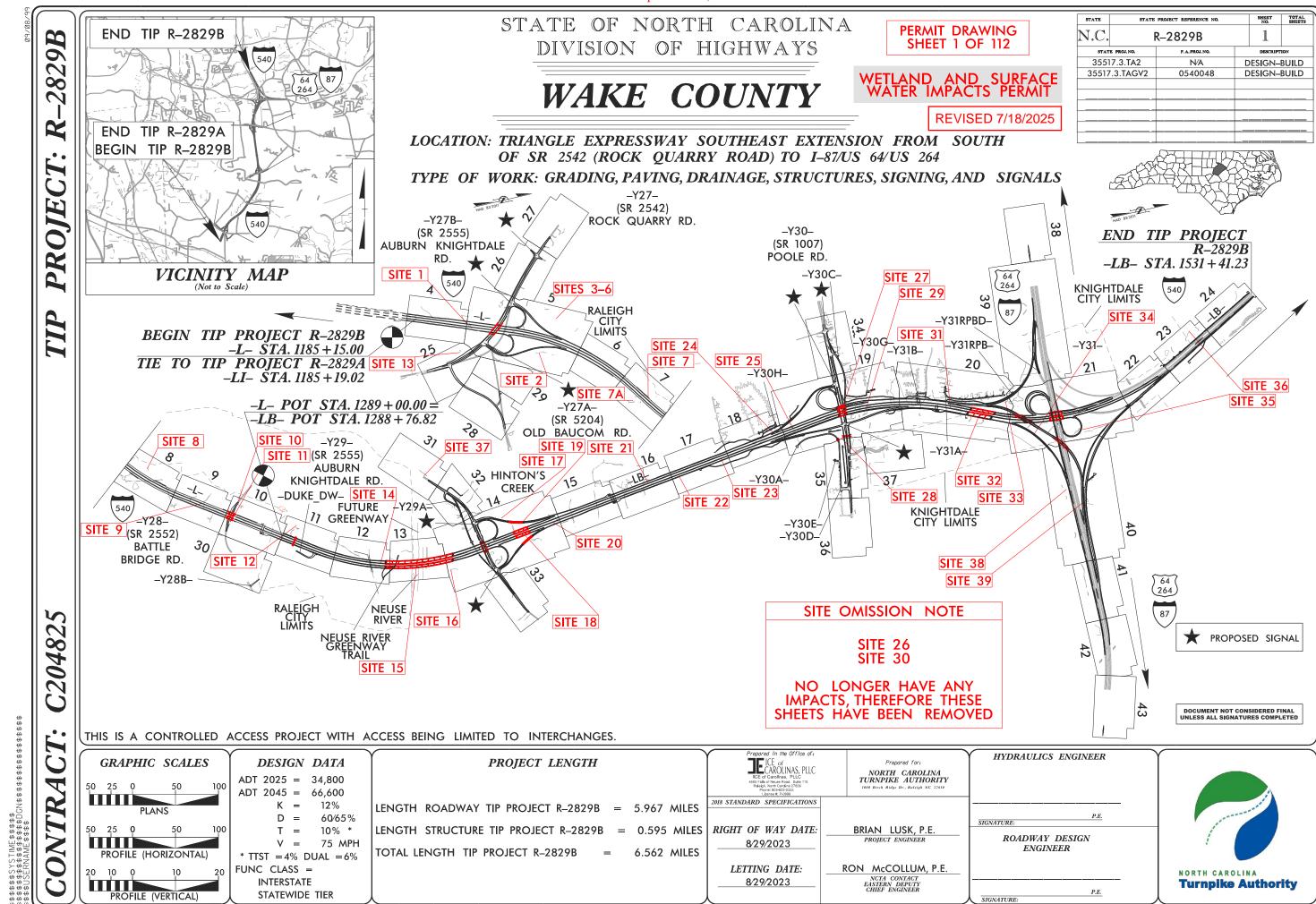
Faith Hardin 3185423002EA45E...

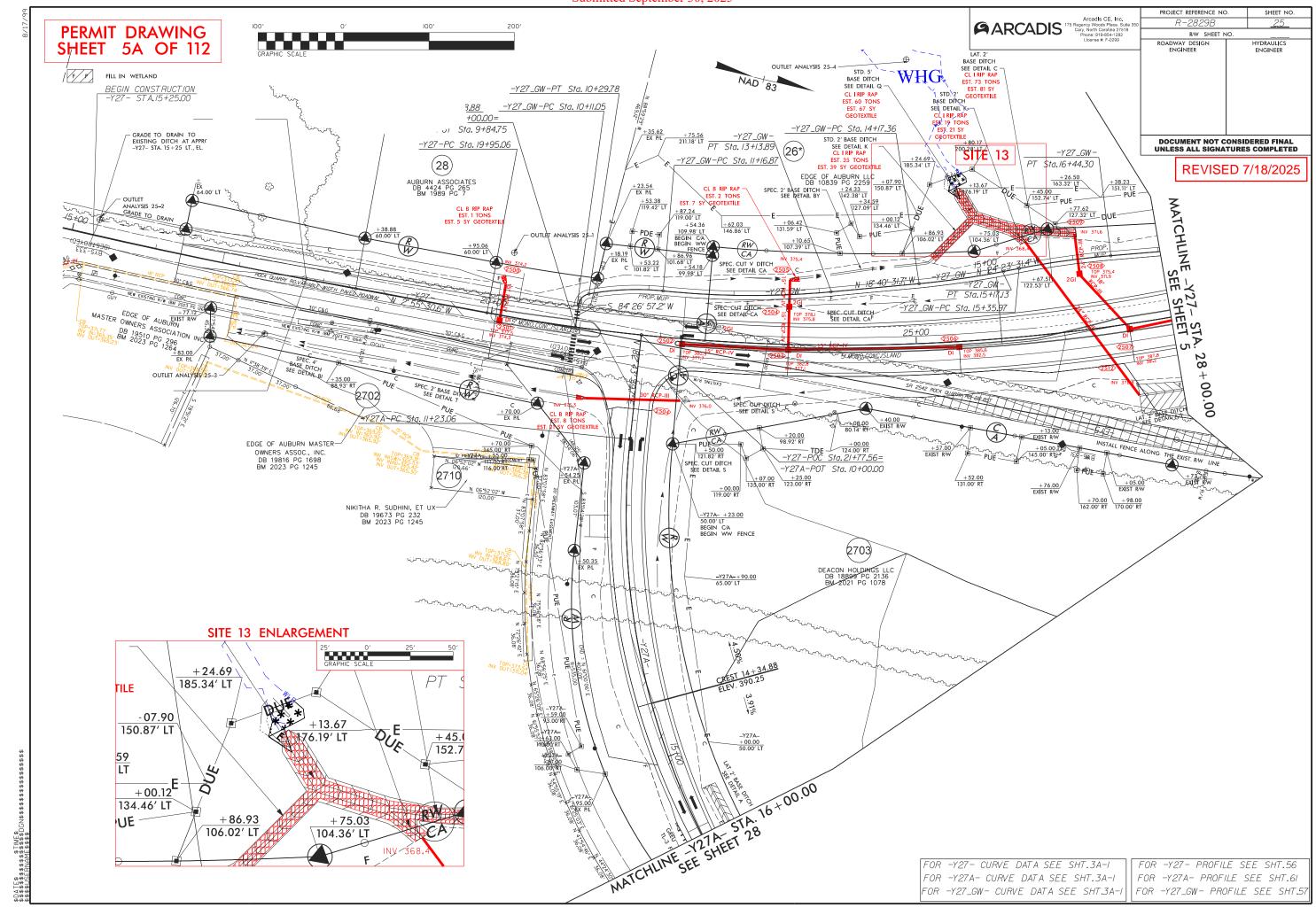
Faith Hardin, Supervisor 401 & Buffer Transportation Permitting Branch

WQC No. 4179

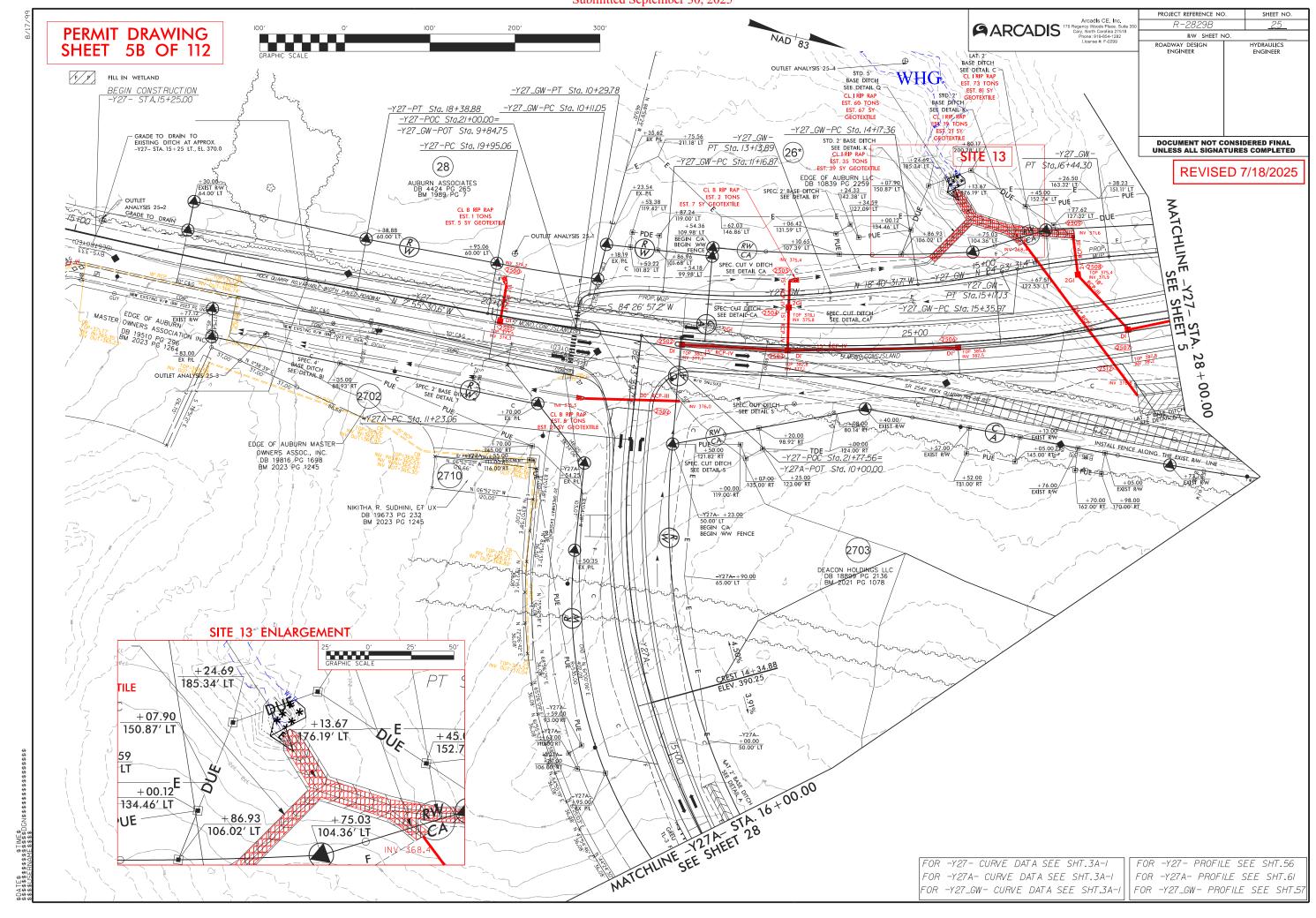


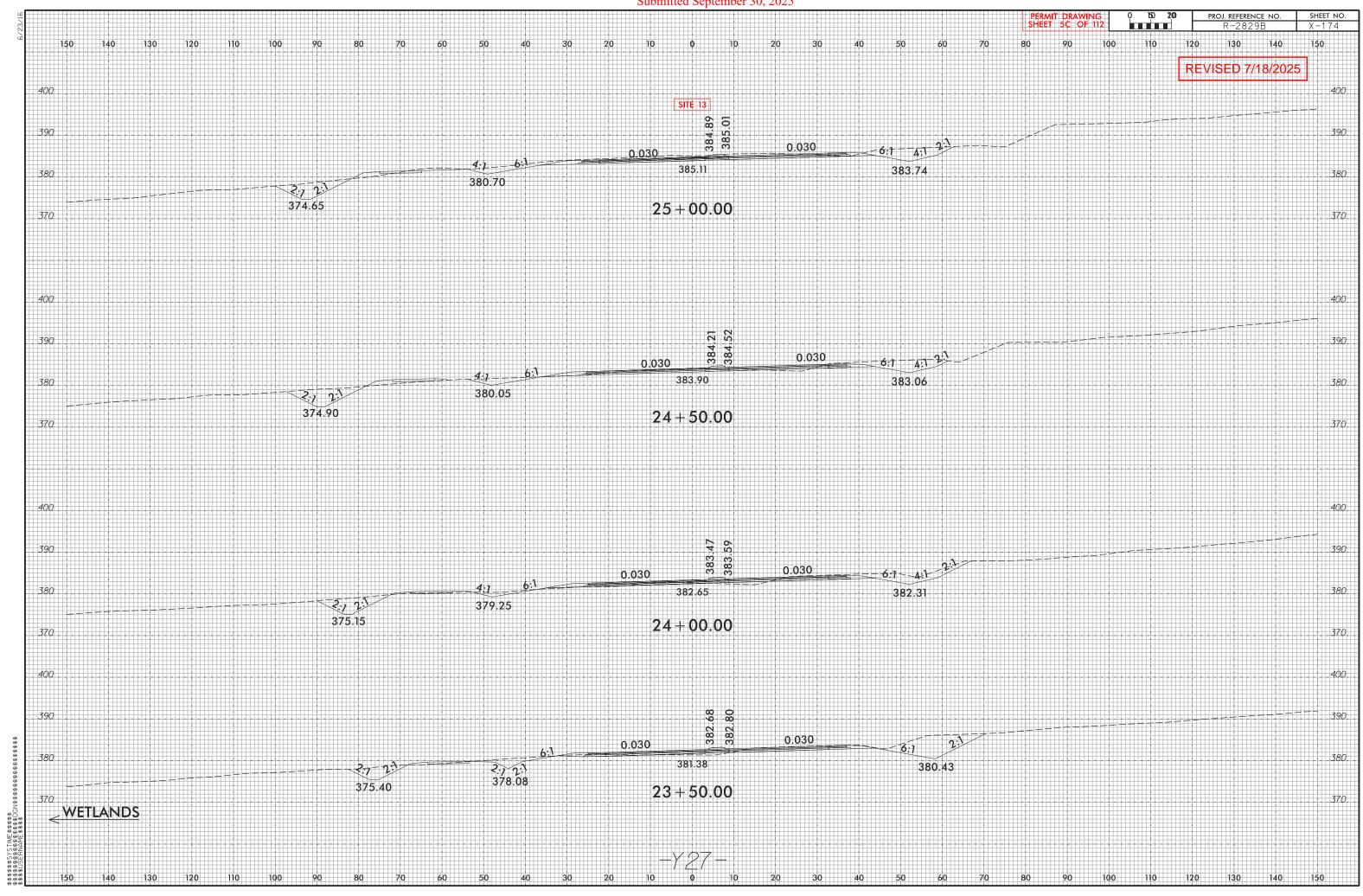
Permitted Drawings

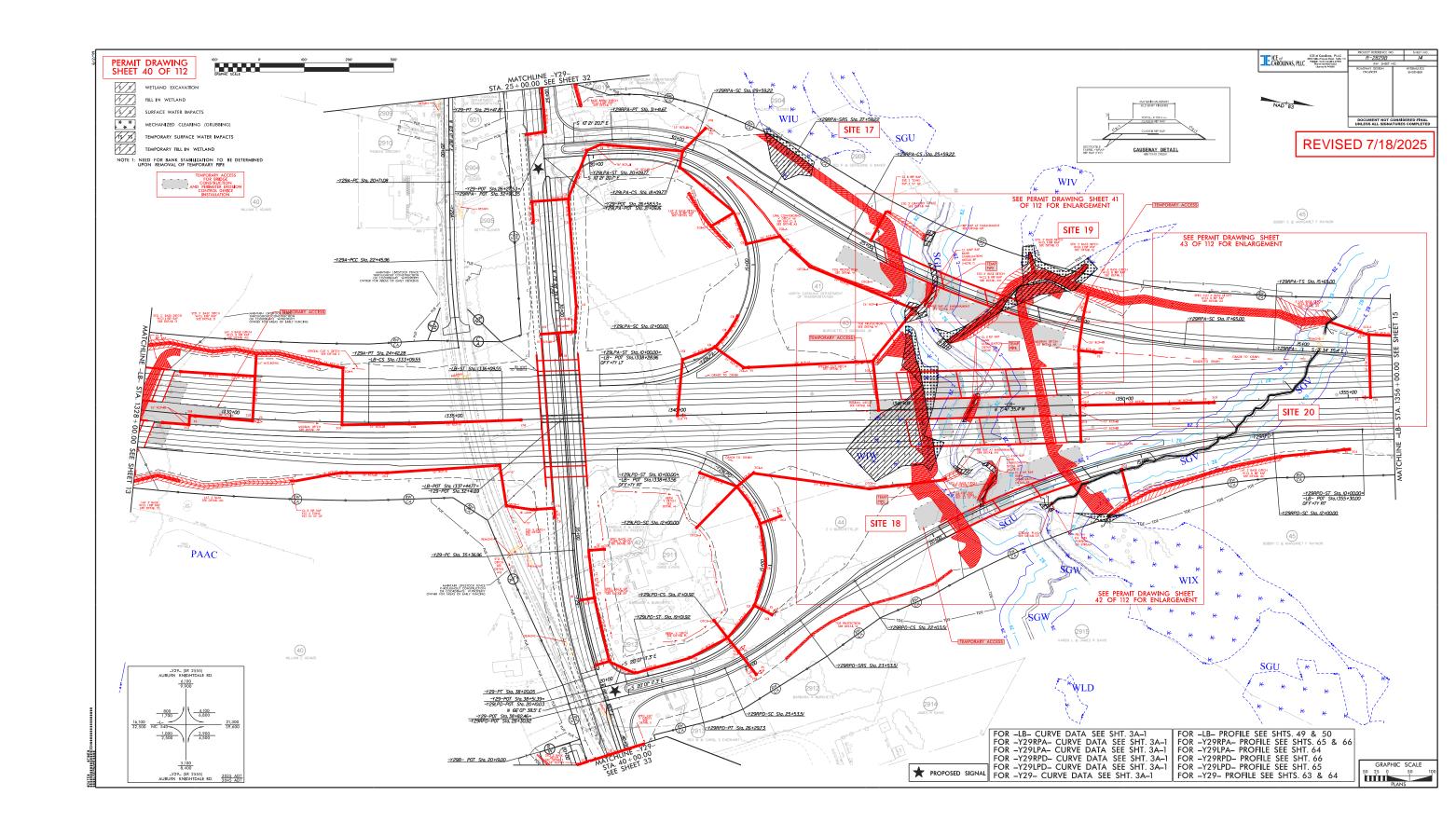


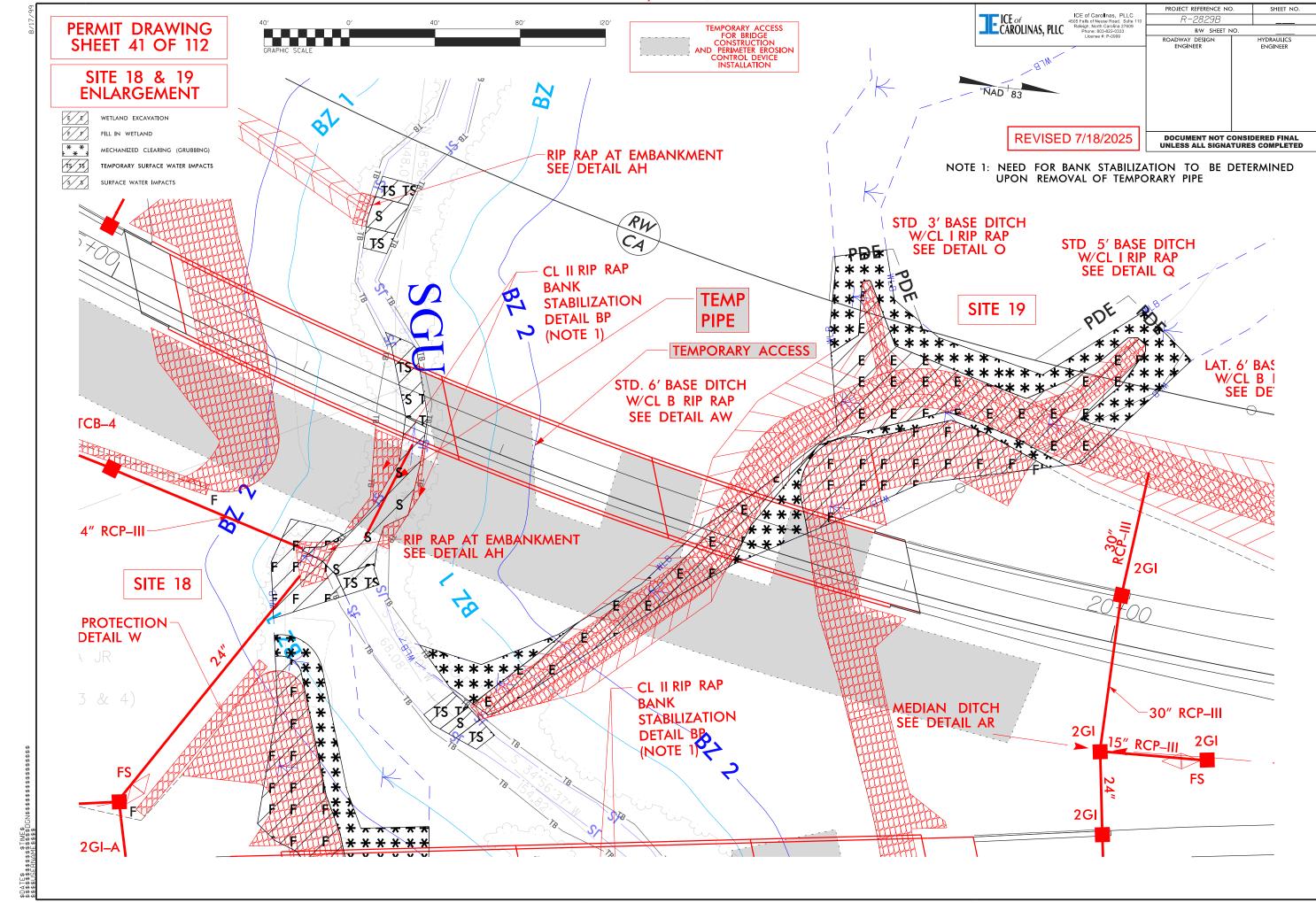


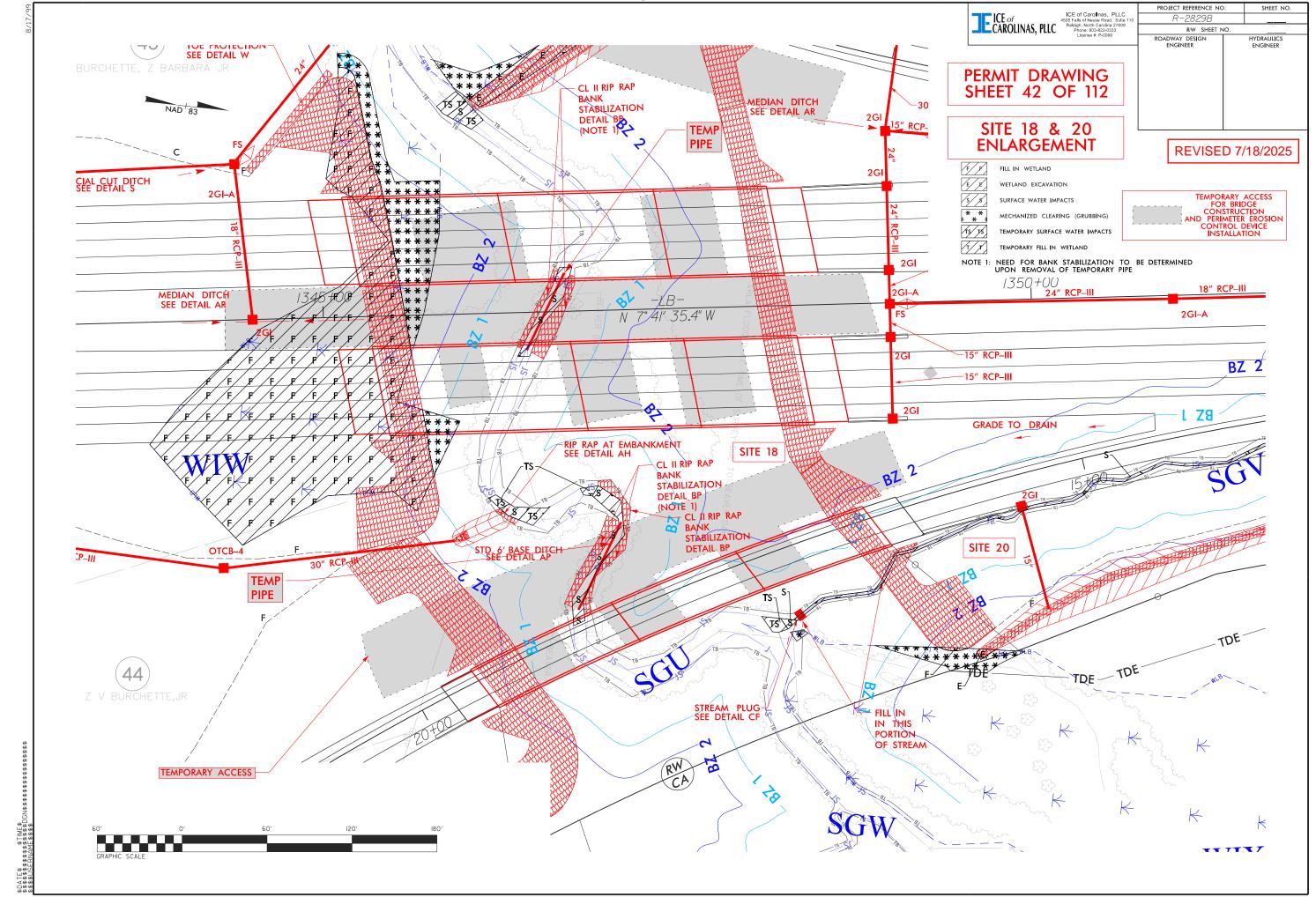
Submitted September 30, 2025

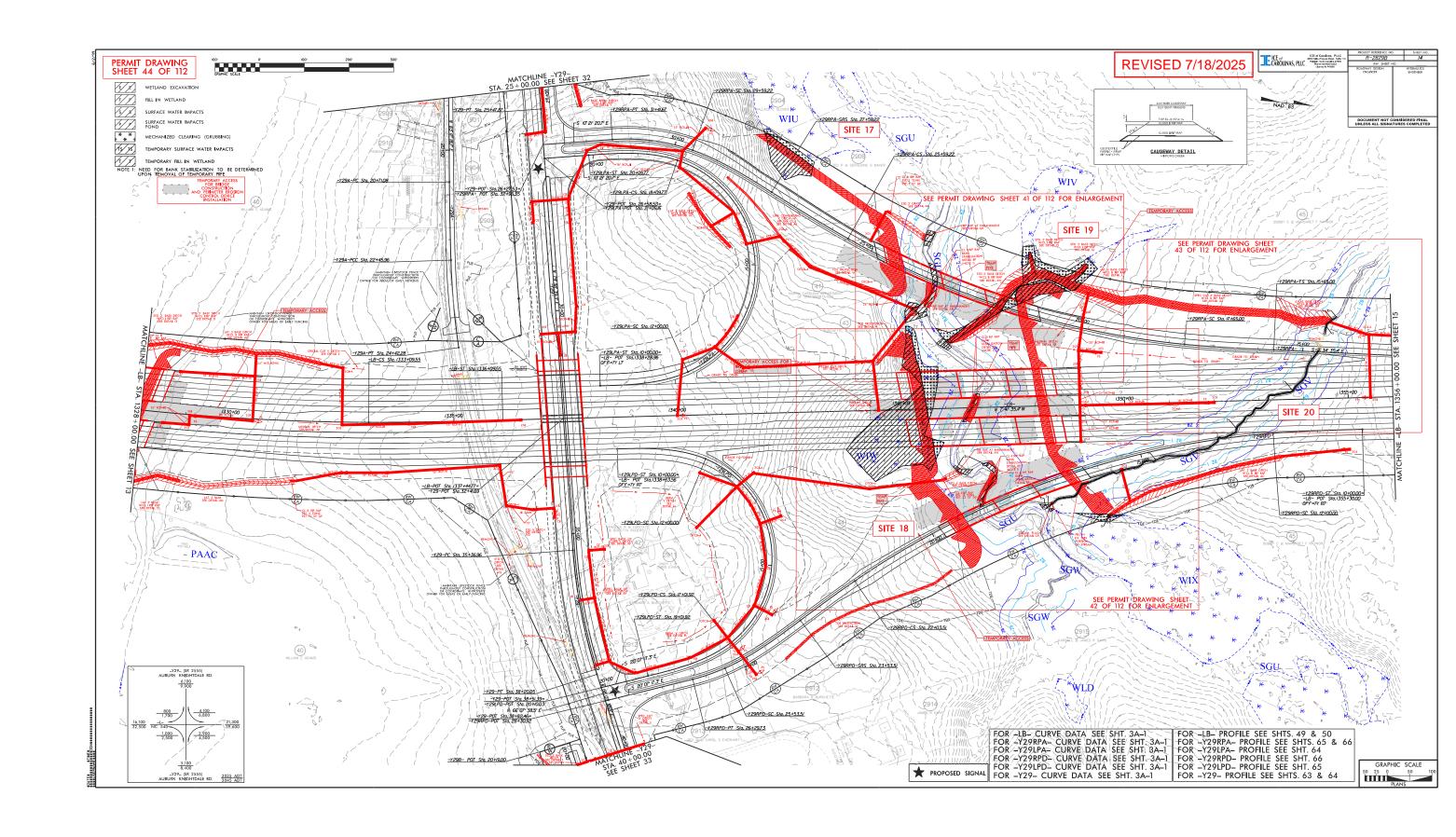


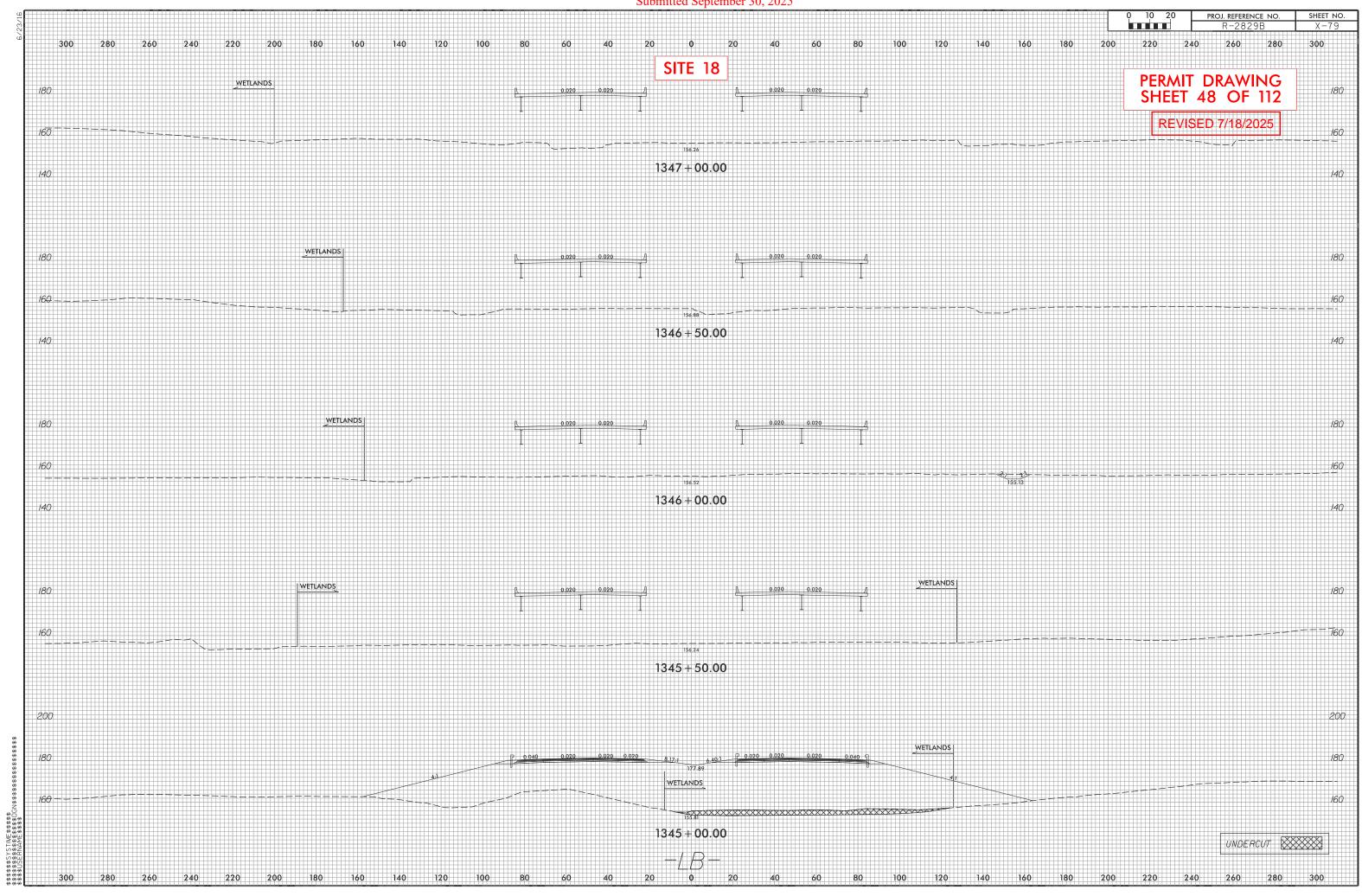


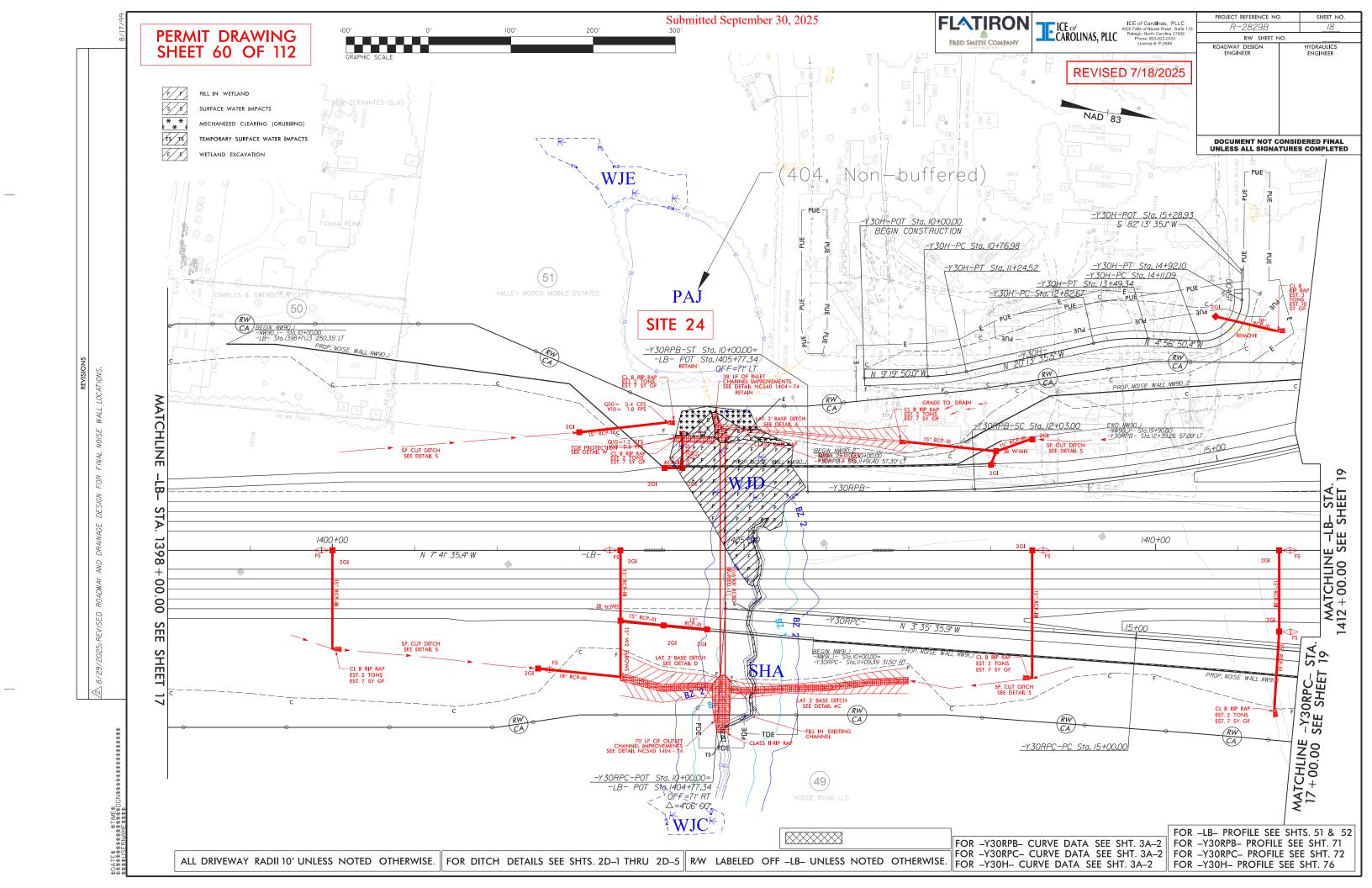


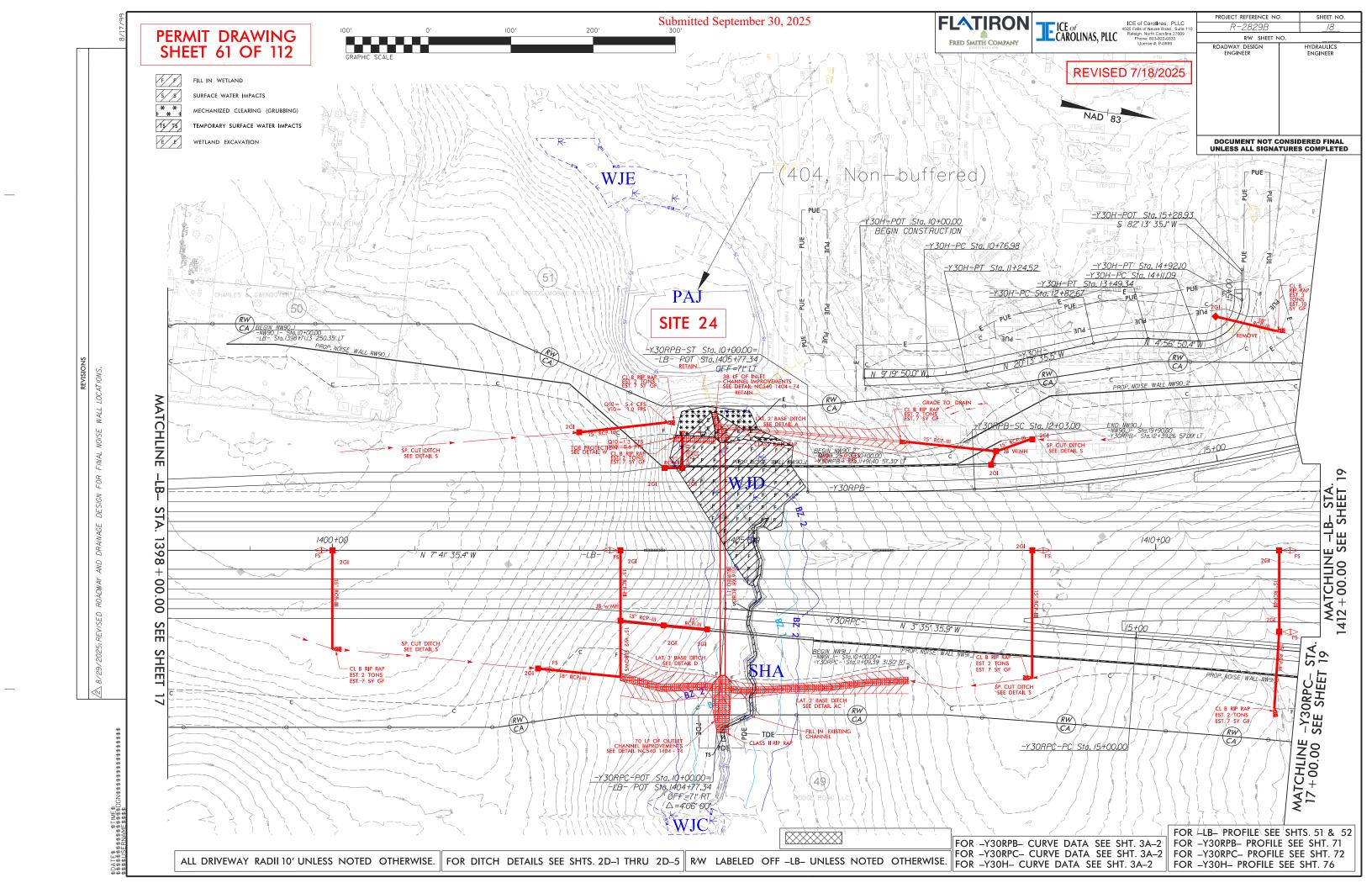












ICE of CAROLINAS, PLLC

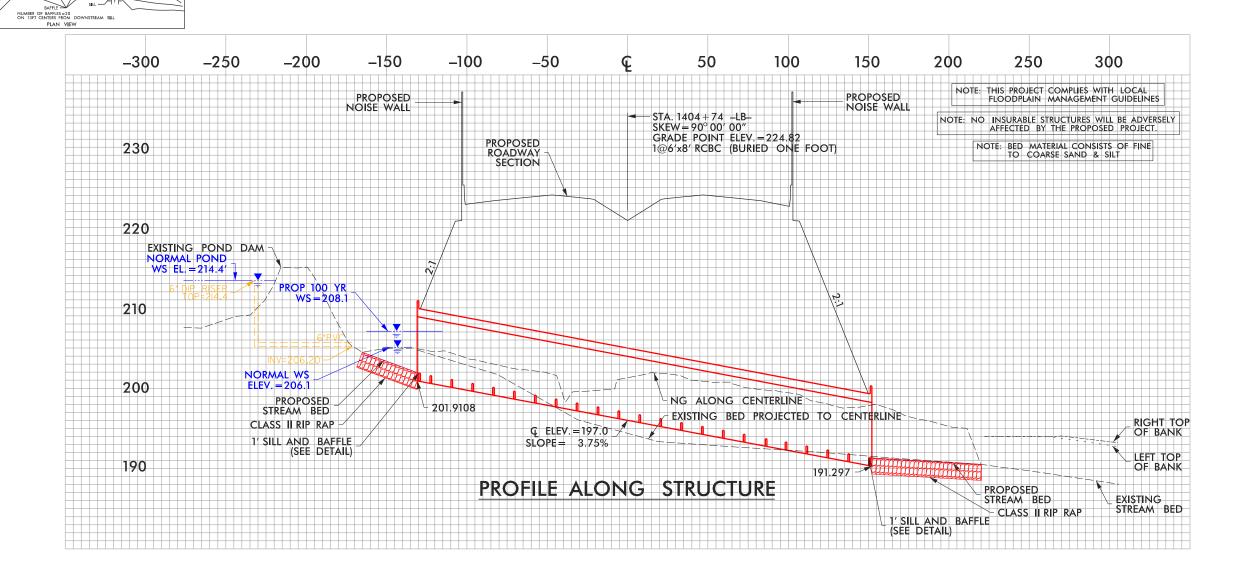
ICE of Carolinas, PLLC 4505 Falls of Neuse Road, Sulte 110 Raleigh, North Carolina 27609 Phone: 803-822-0333

PERMIT DRAWING SHEET 62 OF 112

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

REVISED 7/18/2025

SITE 24

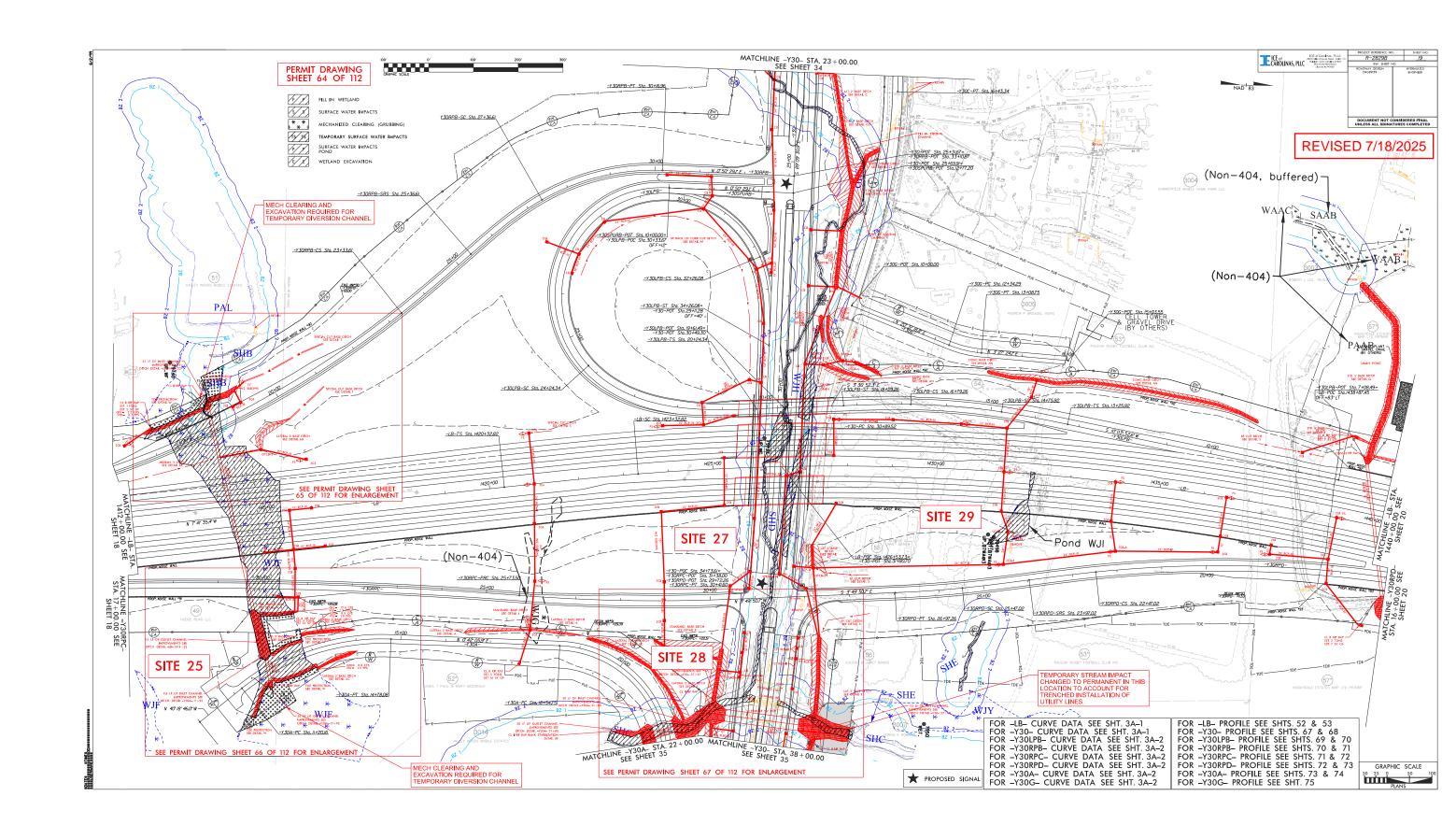


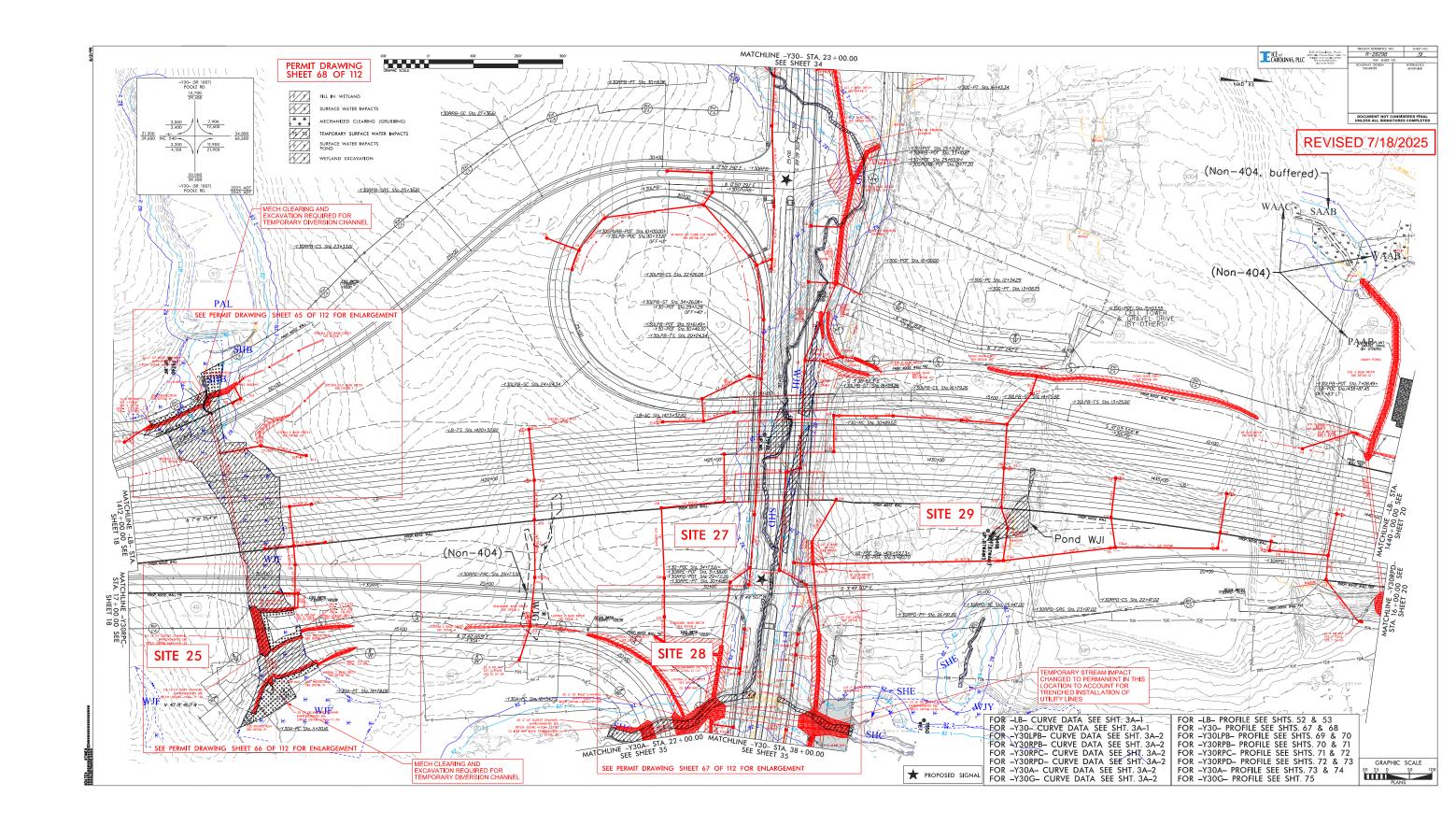
DETAIL
SINGLE BARREL CULVERT LOW FLOW
CHANNEL AND SILLS

1.5 ft.

1) SILLSBAFFLES ARE TO BE 1.0 FT. WIDE, CAST SEPARATELY AND ATTACHED BY DOWELS. 2) TOP OF LOW FLOW SILLSBAFFLES SHOULD MATCH STREAM BED ELEVATION IN LOW FLOW CHANNEL OF STREAM, (HALWEG)

3) DO NOT SET ELEVATION OF HIGH SILL/BAFFLES ABOVE BANK FULL.





ICE of Carolinas, PLLC 4505 Falls of Neuse Road, Sulte 1 Religh, Morth Carolina 27609 Phone: 803-822-0333 [Lones of the 7-0999]

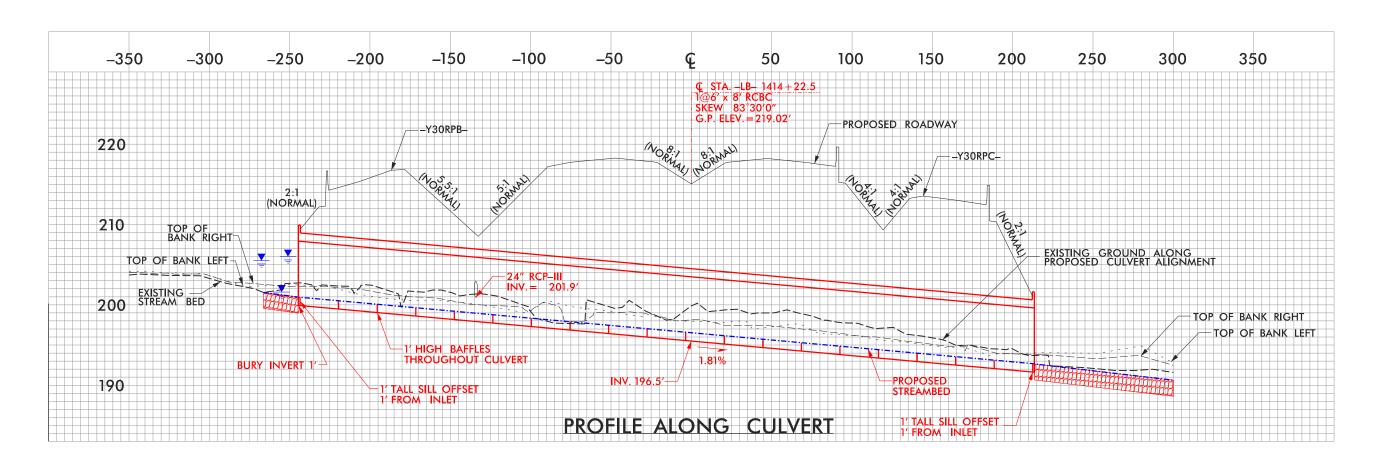
R/W SHEET NO ROADWAY DESIGN ENGINEER HYDRAULICS ENGINEER

PERMIT DRAWING SHEET 69 OF 112

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

REVISED 7/18/2025

SITE 25



ICE of Carolinas, PLIC
CAROLIN

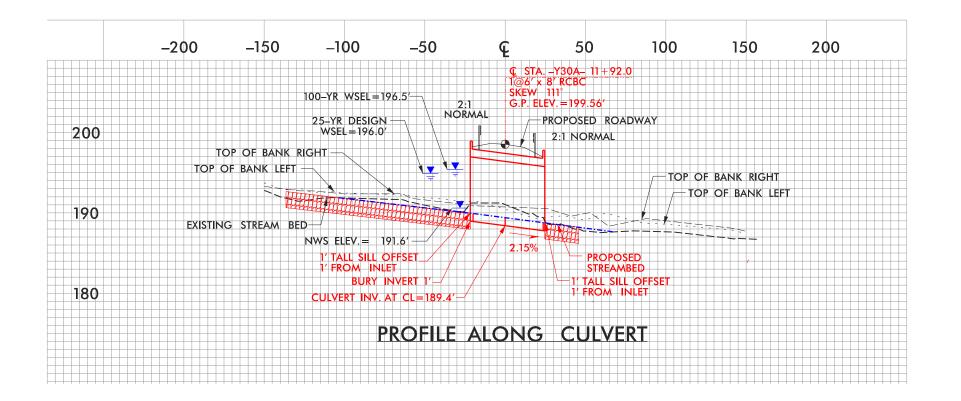
PERMIT DRAWING SHEET 70 OF 112

R/W SHEET NO ROADWAY DESIGN ENGINEER HYDRAULICS ENGINEER

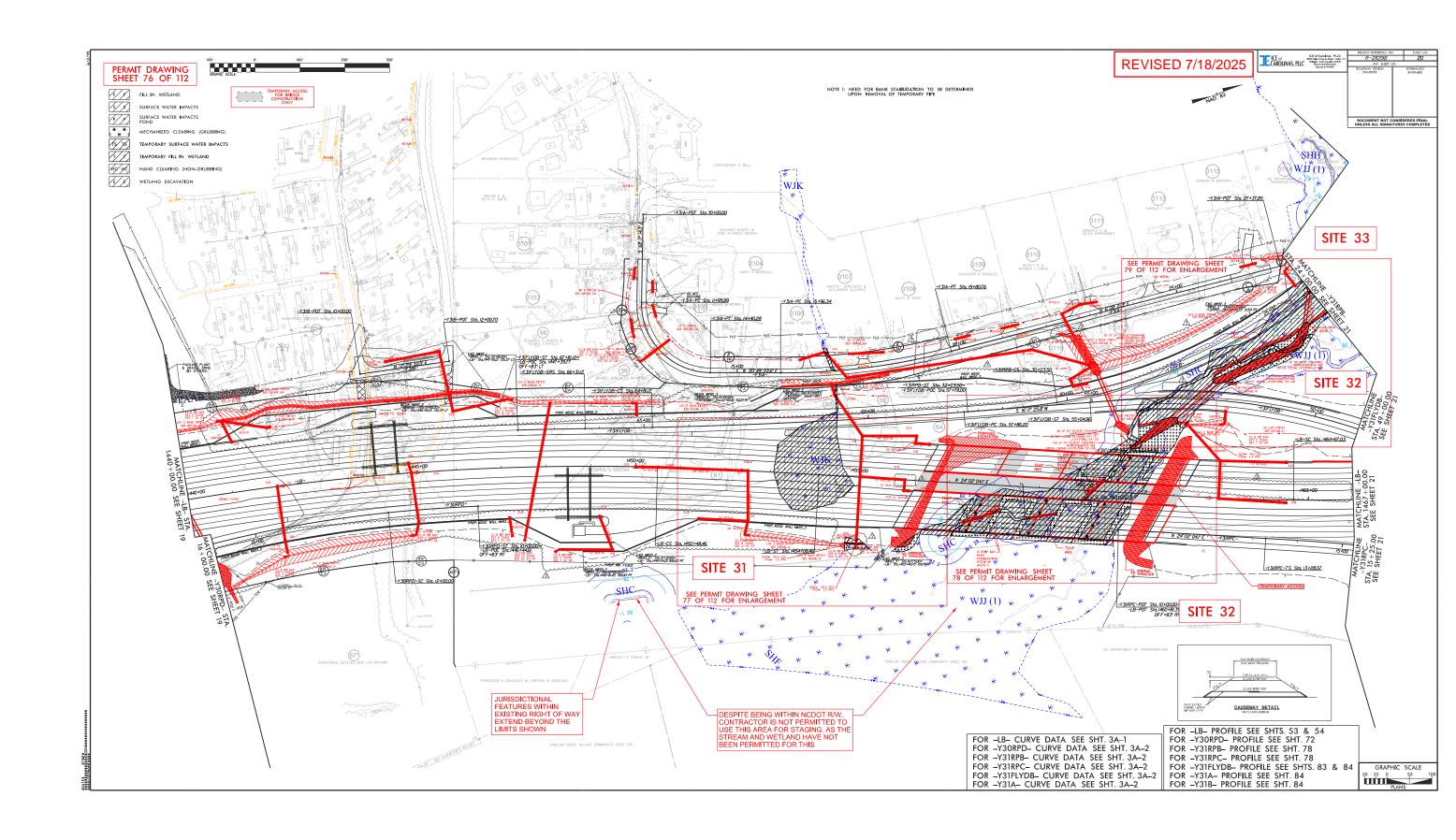
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

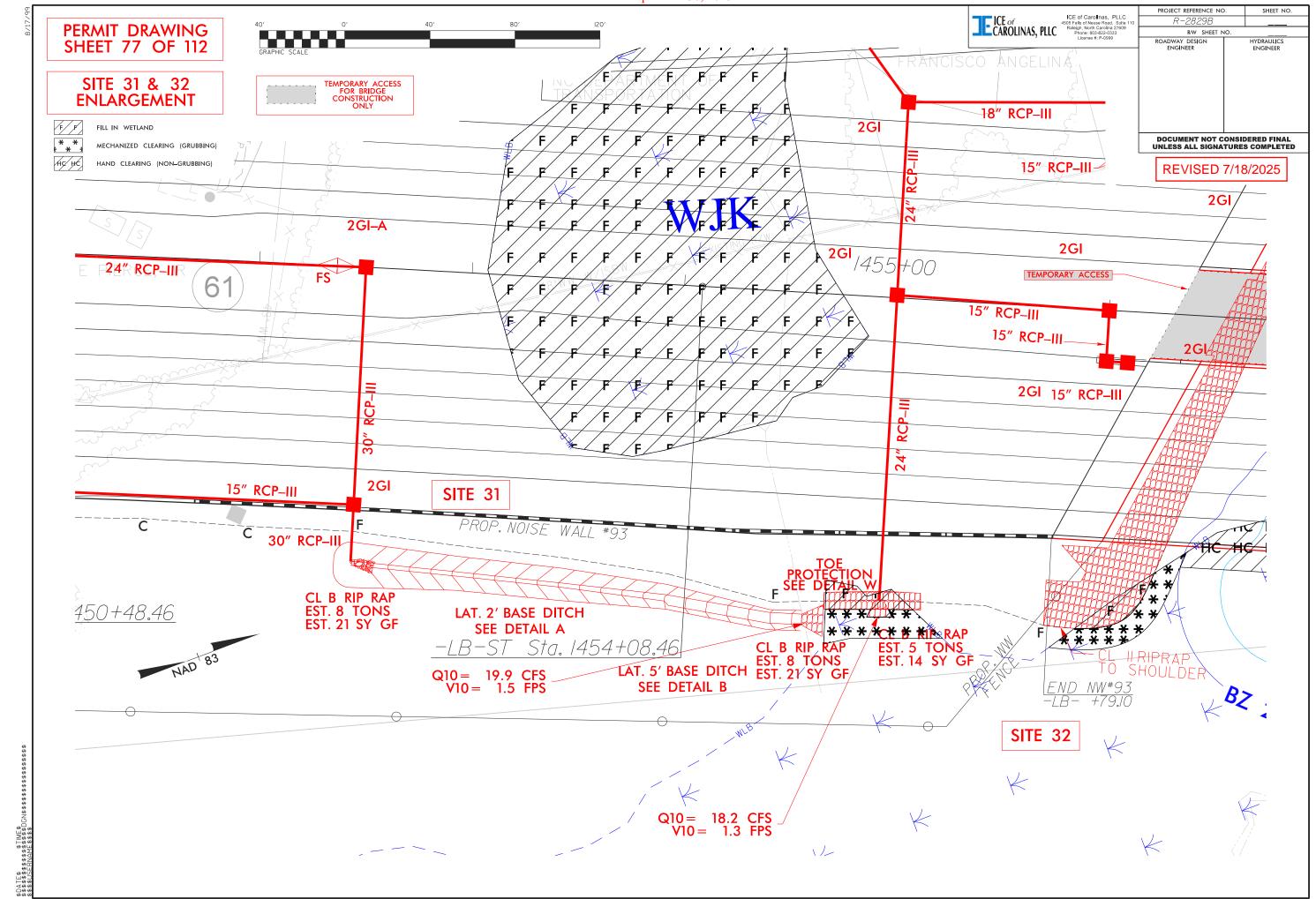
REVISED 7/18/2025

SITE 25

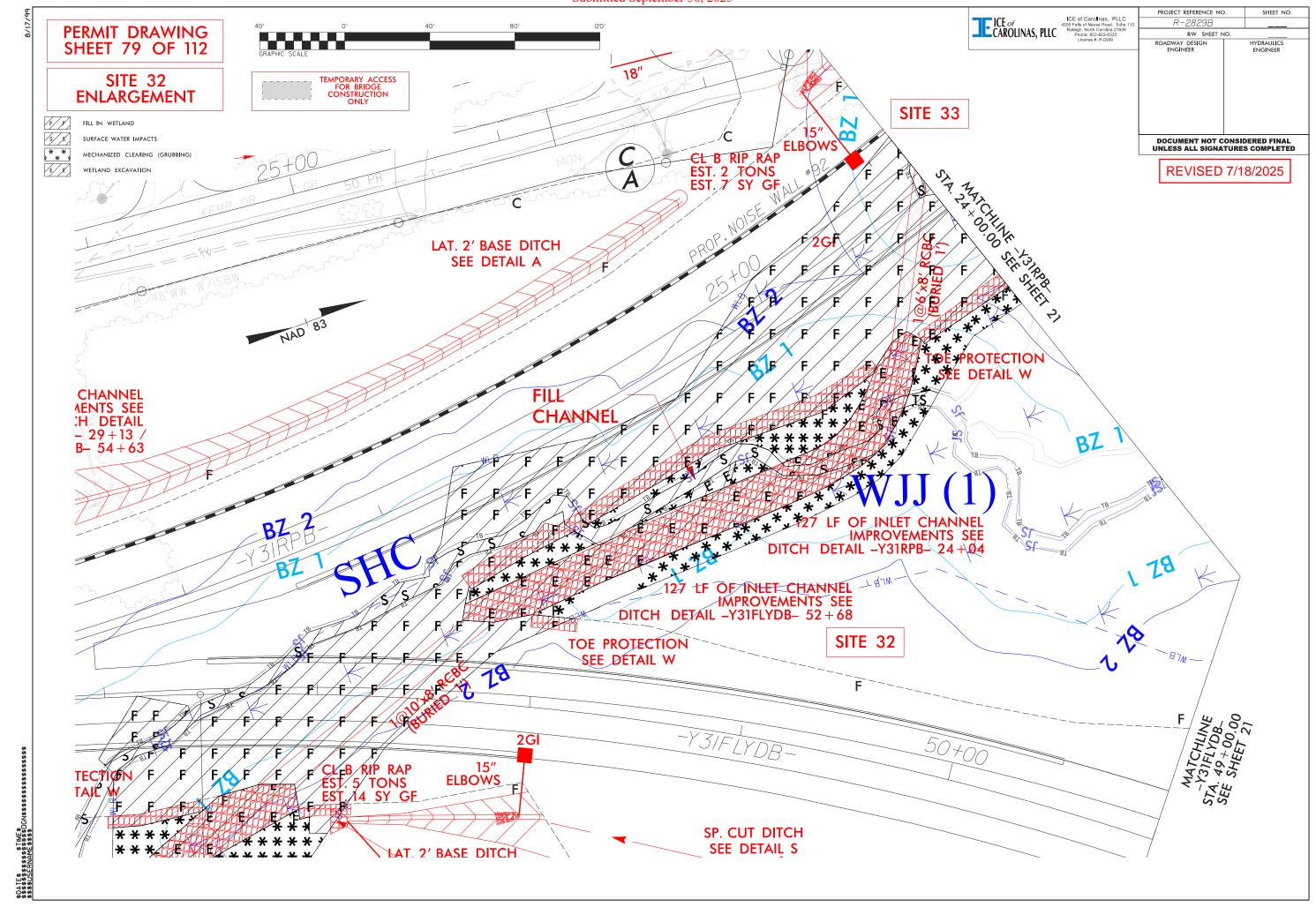


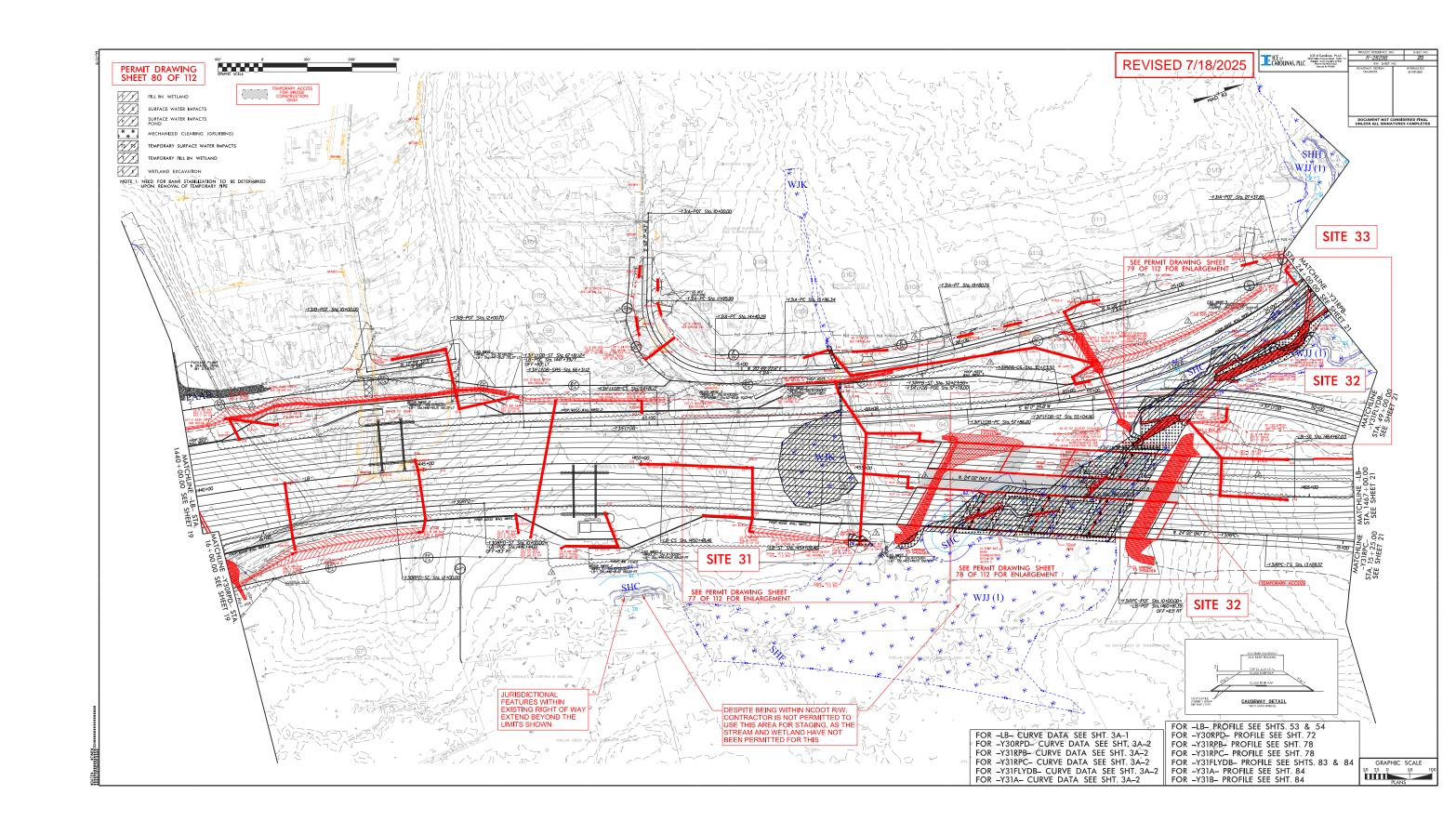
220 240 260 280 300





\$DATE\$ \$\$\$\$\$\$\$\$\$\$\$\$\$\$\$\$DN\$\$\$\$\$\$\$\$\$\$\$\$\$\$





ICE of CAROLINAS, PLLC

ICE of CAROLINAS, PLLC

ICE of Carolinas, PLLC

4505 Falls of Neuse Road, Sube 1

Religip, North Carolina 27609

Phone: 803-822-0333

License #1: P-0.9999

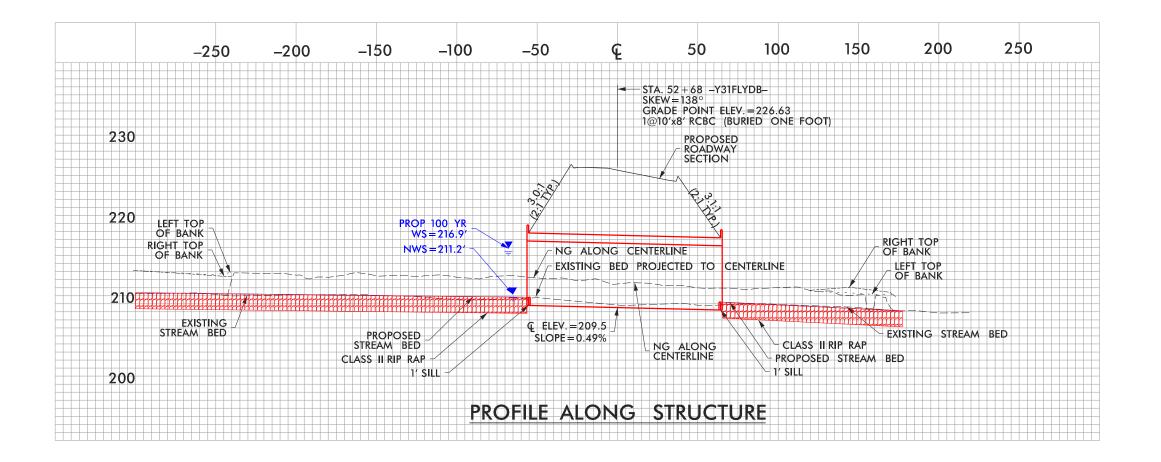
	PROJECT REFERENCE NO	D. SHEET NO.
10	R-2829B	
	R/W SHEET N	10.
	ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER

PERMIT DRAWING **SHEET 81 OF 112**

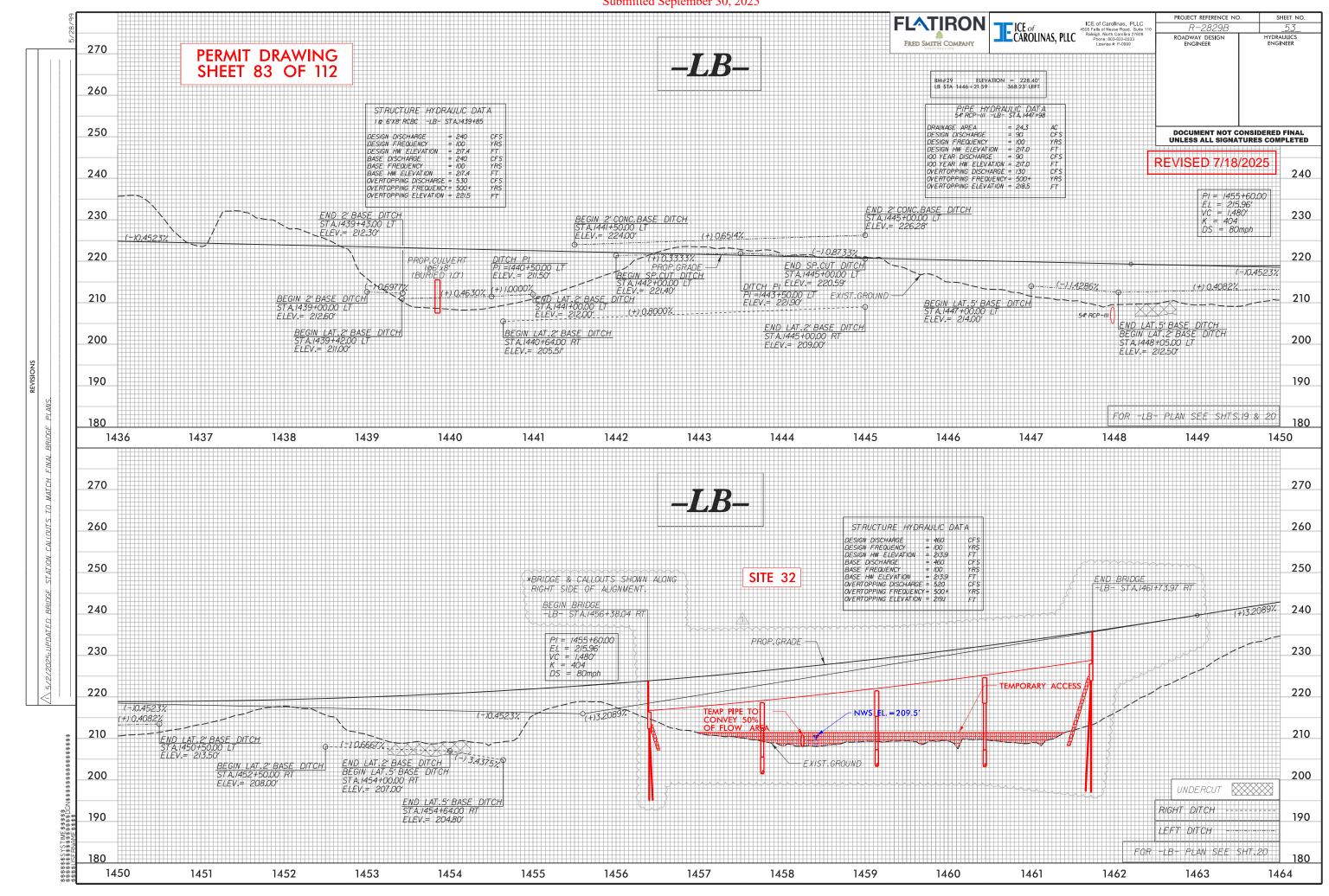
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

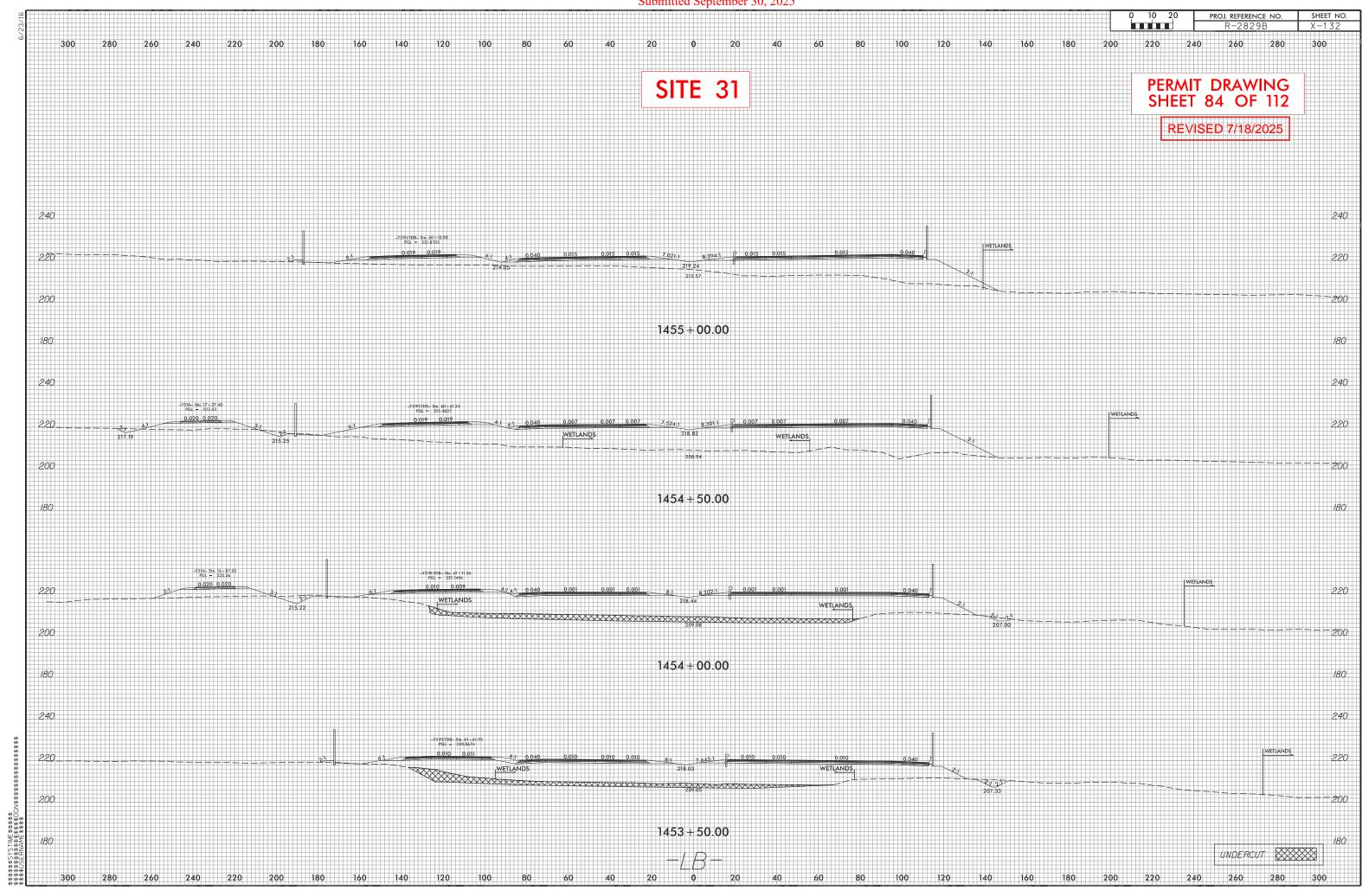
REVISED 7/18/2025

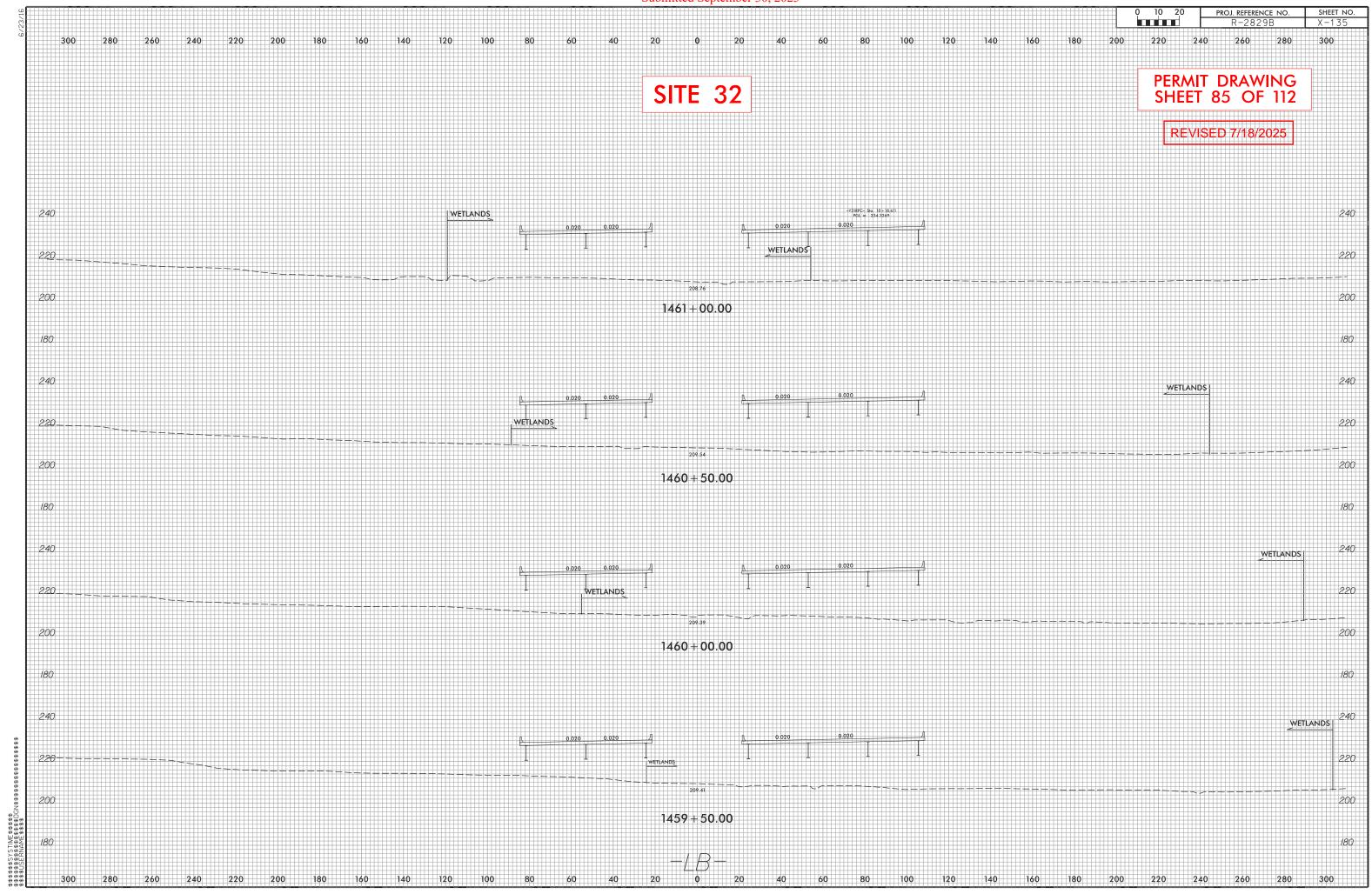
SITE 32



Submitted September 30, 2025







					WET	LAND ANI	D SURACE	WATER I	MPACTS S	SUMMAR	Υ		
					WE	TLAND IMF	PACTS		5	SURFACE	WATER IM	PACTS	
Site No.	Station (From/To)	Structure Size / Type	Wetland and/or Stream ID	Permanent Fill In Wetlands (ac)	Temp. Fill In Wetlands (ac)	Excavation in Wetlands (ac)	Mechanized Clearing in Wetlands (ac)	Hand Clearing in Wetlands (ac)	Permanent SW impacts (ac)	Temp. SW impacts (ac)	Existing Channel Impacts Permanent (ft)	Existing Channel Impacts Temp. (ft)	Natural Stream Design (ft)
1	-L- 1197+22/1198+69, M	ROADWAY FILL	WHH	0.143									
2	-Y27-RPD- 18+86/20+85, LT	EMB. EXCAVATION	WHQ			0.021	0.031						
3	-Y27-RPA- 12+57/22+32, RT	FILL (POND)	WHR, PAH	0.037					7.078				
4	-Y27-RPA- 21+68/23+22, RT	DITCH EXCAVATION	WRV, SOR	0.043		0.040				0.002		34	
5	-Y27-RPA- 13+89/17+08, RT	FILL	WAAH	0.095									
6	-Y27-RPA- 11+97/12+09, RT	DITCH	WHS,SAAM	0.024			0.003			0.002		11	
6	-Y27-RPA- 11+81/12+99, RT	FILL	SGJ						0.022		160		
7	-L- 1241+61/1242+00, RT	BANK STABILIZATION	SGK						0.006	0.005	28	23	
7	-L- 1242+00/1242+30, RT	STRUCTURE STABILIZATION	SGK						0.006		39		
7	-L- 1243+18, M	2 @ 6'x8' RCBC	WHP, SGK	0.027					0.054	0.005	406	23	
7	-L- 1244+17/1244+44, LT	STRUCTURE STABILIZATION	SGK						0.013		55		
7	-L- 1244+19/1244+91, LT	STRUCTURE STABILIZATION	SGJ						0.009	0.009	44	47	
7A	-L- 1240+99/1241+32, RT	DITCH EXCAVATION	WHM				0.038						
8	-L- 1253+21/1253+29, LT	BANK STABILIZATION	SGJ						0.003	0.006	32	42	
8	-L- 1253+21/1253+29, LT	DITCH EXCAVATION	SGJ						0.001	0.001	7	7	
9	-L- 1268+92/1269+46, LT	ROADWAY FILL	WIC	0.052									
10	-Y28- 14+75, LT/RT	BANK STABILIZATION	SGJ						0.004	0.008	32	57	
11	-L- 1276+60/1277+19 RT	ROADWAY FILL	WIH	0.053									
12	-L- 1288+28/1288+34, LT	BANK STABILIZATION	SGI						0.004	0.003	22	17	
12	-L- 1288+34/1288+15, LT	STRUCTURE STABILIZATION	SGI						0.008		48		
12	-L- 1288+18, M	3 @ 7'x8' RCBC	SGI						0.087	0.023	408	105	
12	-L- 1288+11/1288+06, RT	STRUCTURE STABILIZATION	SGI						0.007		26		
12	-L- 1288+06/1288+28, RT	BANK STABILIZATION	SGI						0.014	0.002	61	5	
13	-Y27- 25+62, LT	DITCH EXCAVATION	WHG			0.002	0.006						
14	-LB- 1315+04 TO 1315+72 LT	CHANNEL REALIGNMENT	WIP			0.002	0.011						
14	-LB- 1316+80 TO 1320+05 M	CHANNEL REALIGNMENT	WIQ, SGR	0.044		0.011			0.036		442		
15	-LB- 1320+03 TO 1321+42 M	BRIDGE	Neuse River						0.005	0.009	20	51	
15	-LB- 1320+87 TO 1321+76 M	BRIDGE CAUSEWAY	Neuse River							0.300		220	
15	-LB- 1319+95 TO 1321+83 M	BANK STABILIZATION	Neuse River						0.016	0.019	76	108	
16	-LB- 1323+35 TO 1323+55 RT	DITCH	SGT						0.002	0.001	10	12	
TOTAL	S*:			0.518	0.000	0.076	0.089	0.000	7.375	0.395	1916	762	

^{*}Rounded totals are sum of actual impacts

NOTES:

SITE 15 WETLAND WIR IS NON-404

NC DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS
10/14/2024 (REV 7/18/2025)
WAKE COUNTY

R-2829B

SHEET

110

OF

112

Revised 2018 Feb

	WETLAND AND SURFACE WATER IMPACTS SUMMARY												
					WETLAND IMPACTS			SURFACE WATER IMPACTS					
								Hand			Existing	Existing	
			Wetland	Permanent	Temp.	Excavation	Mechanized	Clearing	Permanent	Temp.	Channel	Channel	Natural
Site	Station	Structure	and/or	Fill In	Fill In	in	Clearing	in	SW	SW	Impacts	Impacts	Stream
No.	(From/To)	Size / Type	Stream ID	Wetlands	Wetlands	Wetlands	in Wetlands	Wetlands	impacts	impacts	Permanent		Design
				(ac)	(ac)	(ac)	(ac)	(ac)	(ac)	(ac)	(ft)	(ft)	(ft)
17	-Y29RPA- 28+45 TO 27+03 LT	ROADWAY FILL	WIU	0.118			0.031						
18	-LB- 1343+75 TO 1348+35 M**	BRIDGE CAUSEWAY	SGU, WIW	0.615		0.028	0.113			0.007		73	
18	-LB- 1345+30 TO 1346+41 M	BANK STABILIZATION	SGU						0.071	0.016	306	36	
19	-Y29RPA- 19+91 TO 22+80 M ***	BRIDGE/CHANNEL CHANGE	WIV	0.066		0.133	0.115						
20	-LB- 1348+26 TO 1354+79 M	ROADWAY FILL	SGV, WIX	0.001		0.001	0.021		0.036	0.001	793	12	
21	-LB- 1373+42 TO 1374+06 RT	ROADWAY FILL	WIY	0.089			0.032						
22	-LB- 1377+53 TO 1382+16 M	ROADWAY FILL	SGY, WIZ	0.181					0.021		309		
22	-LB- 1381+13 TO 1381+24 LT	COUNTERSUNK RIPRAP	SGY						0.002	0.001	28	10	
22	-LB- 1381+15 TO 1381+55 LT	ROADWAY FILL	WJA	0.002		0.003	0.036						
22	-LB- 1377+53 TO 1380+76 RT	ROADWAY FILL (POND)	PAI						1.679				
23	-LB- 1390+22 TO 1390+64 RT	ROADWAY FILL	WJB				0.011						
23	-LB- 1388+53 TO 1394+71 M	ROADWAY FILL (POND)	PAK						4.543				
24	-LB- 1404+10 TO 1405+75 M	1 @ 6'x8' RCBC	SHA, WJD	0.357		0.039	0.044		0.023		290		
24	-LB- 1404+71 TO 1404+82 RT	COUNTERSUNK RIPRAP	SHA						0.001	0.001	15	11	
25	-LB- 1412+45 TO 1415+37 M	1 @ 6'x8' RCBC	SHB, WJD	1.232		0.039	0.102		0.003		48		
25	-LB- 1413+94 LT	COUNTERSUNK RIPRAP	SHB							0.001	8	13	
25	-Y30A- 10+58 TO 12+97 M	1 6'x8'	SHD	0.209		0.042	0.156						
27	-Y30- 22+73 TO 37+02 M	ROADWAY FILL	SHC	0.271					0.171		1804		
27	-Y30- 22+79 RT	COUNTERSUNK RIPRAP	SHC						0.001	0.001	10	10	
28	-Y30- 36+94 TO 37+96 M	2 @ 12'x11'	SHC						0.041		174		
28	-Y30- 37+24 TO 37+64 LT	COUNTERSUNK RIPRAP	SHC						0.029	0.003	83	9	
28	-Y30- 37+21 TO 38+01 RT	CHANNEL CHANGE	SHC						0.015		39		
28	-Y30A- 21+58 TO 22+00 M	3 @ 12'x11'	SHC						0.022		48		
28	-Y30A- 21+64 TO 21+94 RT	COUNTERSUNK RIPRAP	SHC						0.015		30		
28	-Y30A- 21+37 TO 22+00 RT	BANK STABILIZATION	SHC						0.031	0.005	65	10	
29	-Y30RPD- 25+73 TO 25+06 LT	ROADWAY FILL	SHE						0.024		173		
29	-LB- 1431+22 TO 1432+16 M	ROADWAY FILL (POND)	POND WJI						0.106				
TOTAL	S*:			3.141	0.000	0.285	0.661	0.000	6.834	0.036	4223	184	

^{*}Rounded totals are sum of actual impacts

NOTES:

SITE 26 CONTAINS NO WET IMPACTS AND HAS BEEN OMITTED FROM SUMMARY SITE 30 CONTAINS NO WET IMPACTS AND HAS BEEN OMITTED FROM SUMMARY NC DEPARTMENT OF TRANSPORTATION DIVISION OF HIGHWAYS 10/14/2024 (REV 09/27/2025 WAKE COUNTY

R-2829B

112

OF

Revised 2018 Feb

SHEET 111

^{**} SITE 18 Mechanized clearing total has been calculated for the worst-case scenario of losing entire wetland WIW

^{***} SITE 19 There will be temporary fill placed in the 0.003 ac. under the causeway which will be removed post-construction

WETLAND AND SURFACE WATER IMPACTS SUMMARY													
				WETLAND IMPACTS				SURFACE WATER IMPACTS					
Site No.	Station (From/To)	Structure Size / Type	Wetland and/or Stream ID	Permanent Fill In Wetlands (ac)	Temp. Fill In Wetlands (ac)	Excavation in Wetlands (ac)	Mechanized Clearing in Wetlands (ac)	Hand Clearing in Wetlands (ac)	Permanent SW impacts (ac)	Temp. SW impacts (ac)	Existing Channel Impacts Permanent (ft)	Existing Channel Impacts Temp. (ft)	Natural Stream Design (ft)
31	-LB- 1453+07 TO 1454+88 M	ROADWAY FILL	WJK	0.615			0.015						
32	-LB- 1456+41 TO 1461+83 M	BRIDGE / BANK STABILIZATION	SHC, WJJ(1)	0.008	0.623		0.270	0.39	0.02	0.009	195	74	
32	-LB- 1454+75 TO 1456+43 RT	ROADWAY FILL	WJJ(1)	0.013			0.034						
32	-Y31FLYDB- 51+90 TO 54+62 M	1 @ 10'x8' RCBC	SHC, WJJ(1)	0.218		0.048	0.101		0.032		255		
32	-Y31RPB- 23+56 TO 27+29 M	RDY FILL/CHANNEL CHANGE	SHC, WJL	0.407		0.094	0.119		0.045	0.002	319	14	
32	-Y31LPB- 17+74 TO 23+16 M	ROADWAY FILL	SHC, WJJ(1)	0.346		0.037	0.069		0.100	0.001	967	11	
32	-Y31LPB- 18+26 TO 18+67 RT	ROADWAY FILL	WJL	0.018									
33	-Y31RPB- 21+60 TO 24+06 M	1 @ 6'x8' RCBC	SHH, WJJ(1)			0.052	0.083		0.007	0.001	127	11	
34	-Y31RPC- 21+40 TO 26+00 M	ROADWAY FILL	WJJ(2)	1.052			0.120						
35	-Y31LPD- 19+31 TO 21+97 M	ROADWAY FILL	SHM, WJX	0.144						0.002		16	
35	-Y31LPD- 18+56 TO 19+86 LT	ROADWAY FILL (POND)	PAM						0.698				
35	-Y31RPD- 55+77 TO 56+11 LT	ROADWAY FILL	WJS	0.007			0.005						
36	-LB- 1516+53 TO 1516+56 LT	42" RCP-III	SAAJ								13		
36	-LB- 1516+45 TO 1516+56 LT	COUNTERSUNK RIPRAP	SAAJ						0.004		37	10	
37	-Y29- 8+37 TO 8+54 LT	RIPRAP AT EMBANKMENT	Neuse River						0.003	0.005	26	37	
38	-Y31- 76+81 TO 79+47 RT	1@9'x6' RCBC EXTENSION	SHL, WJJ(2)	0.128			0.091		0.013		31		
38	-Y31- 77+71 TO 78+03 RT	COUNTERSUNK RIPRAP	SHL						0.009		33		
38	-Y31- 77+16 TO 77+48 RT	BANK STABILIZATION	SHL						0.006	0.021	32	78	
38	-Y31- 76+91 TO 77+28 RT	ROADWAY FILL	SAAL						0.005		46		
39	-Y31RPD- 36+61 TO 40+84 RT	1@9'x6' RCBC EXTENSION	SHL, WJJ(1)	0.508		0.003	0.142		0.014		55		
39	-Y31RPD- 39+93 TO 40+03 RT	COUNTERSUNK RIPRAP	SHL						0.004	0.002	25	15	
	PAGE 110 TOTALS			0.518		0.076	0.089		7.375	0.395	1916	762	
	PAGE 111 TOTALS			3.141		0.285	0.661		6.834	0.036	4223	184	
TOTAL	<u>I</u> S*:			7.123	0.623	0.595	1.799	0.390	15.170	0.474	8300	1212	

^{*}Rounded totals are sum of actual impacts

NOTES:

WETLAND WIT (former Site 37) ON PSH 32 HAS BEEN REMOVED AND OMITTED FROM WETLAND IMPACT SUMMARY

NC DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS
10/14/2024 (REV 07/18/2025)
WAKE COUNTY

R-2829B

SHEET 112 OF 112

Mitigation Acceptance Letters

U.S. ARMY CORPS OF ENGINEERS

Wilmington District

Compensatory Mitigation Responsibility Transfer Form

Permittee: NCDOT Turnpike Authority Action ID: SAW-2009-02240

Project Name: Complete 540, R-2829B Mod, Sites 13-32 County: Wake

Instructions to Permittee: The Permittee must provide a copy of this form to the Mitigation Sponsor, either an approved Mitigation Bank or the North Carolina Division of Mitigation Services (NCDMS), who will then sign the form to verify the transfer of the mitigation responsibility. Once the Sponsor has signed this form, it is the Permittee's responsibility to ensure that Wilmington District Project Manager identified on page two is in receipt of a signed copy of this form before conducting authorized impacts, unless otherwise specified below. If more than one Mitigation Sponsor will be used to provide the mitigation associated with the permit, or if the impacts and/or the mitigation will occur in more than one 8-digit Hydrologic Unit Code (HUC), multiple forms will be attached to the permit, and the separate forms for each Sponsor and/or HUC must be provided to the appropriate Mitigation Sponsors.

Instructions to Sponsor: The Sponsor verifies that the mitigation requirements (credits) shown below have been released and are available at the identified site. By signing below, the Sponsor is accepting full responsibility for the identified mitigation, regardless of whether they have received payment from the Permittee. Once the form is signed, the Sponsor must update the bank ledger and provide a copy of the signed form and the updated ledger to the Permittee, the Project Manager who issued the permit, the Bank Project Manager, and the District Mitigation Office (see contact information on page 2). The Sponsor must also comply with all reporting requirements established in their authorizing instrument.

Permitted Impacts and Compensatory Mitigation Requirements

Permitted Impacts Requiring Mitigation*: 8-digit H

Stream	m Impacts (linea	r feet)	Wetland Impacts (acres)						
Warm	Cool	Cold	Riparian Riverine	Riparian Non-Riverine	Non-Riparian	Coastal			
				0.025					

^{*}If more than one mitigation sponsor will be used for the permit, only include impacts to be mitigated by this sponsor.

Compensatory Mitigation Requirements: 8-digit HUC and Basin: 03020201. Neuse River Basin

	Stream	n Mitigation (credi	ts)	Wetland Mitigation (credits)							
	Warm	Cool	Cold	Riparian Riverine	Riparian Non-Riverine	Non-Riparian	Coastal				
					0.050						

Mitigation Site Debited: Wildland Holdings III, LLC; Falling Creek Umbrella Mitigation Bank: Falling Creek Mitigation Site (List the name of the bank to be debited. For umbrella banks, also list the specific site. For NCDMS, list NCDMS. If the NCDMS acceptance letter identifies a specific site, also list the specific site to be debited).

Section to be completed by the Mitigation Sponsor

Statement of Mitigation Liability Acceptance: I, the undersigned, verify that I am authorized to approve mitigation transactions for the Mitigation Sponsor shown below, and I certify that the Sponsor agrees to accept full responsibility for providing the mitigation identified in this document (see the table above), associated with the USACE Permittee and Action ID number shown. I also verify that released credits (and/or advance credits for NCDMS), as approved by the Wilmington District, are currently available at the mitigation site identified above. Further, I understand that if the Sponsor fails to provide the required compensatory mitigation, the USACE Wilmington District Engineer may pursue measures against the Sponsor to ensure compliance associated with the mitigation requirements.

Mitigation Sponsor Name: Wildlands Holdings III, LLC						
Name of Sponsor's Authorized Representative: Daniel Johnson						
Daniel Johnson	10/08/2025					
Signature of Sponsor's Authorized Representative	Date of Signature					

Page 1 of 2 Form Date July 7, 2020

USACE Wilmington District Compensatory Mitigation Responsibility Transfer Form, Page 2

Conditions for Transfer of Compensatory Mitigation Credit:

- Once this document has been signed by the Mitigation Sponsor and the District is in receipt of the signed form, the Permittee is no longer responsible for providing the mitigation identified in this form, though the Permittee remains responsible for any other mitigation requirements stated in the permit conditions.
- Construction within jurisdictional areas authorized by the permit identified on page one of this form can begin only after the District is in receipt of a copy of this document signed by the Sponsor, confirming that the Sponsor has accepted responsibility for providing the mitigation requirements listed herein. When NCDMS provides mitigation for authorized impacts conducted by the North Carolina Department of Transportation (NCDOT), construction within jurisdictional areas may proceed upon permit issuance; however, a copy of this form signed by NCDMS must be provided to the District within 30 days of permit issuance. NCDOT remains fully responsible for the mitigation until the District has received this form, confirming that the Sponsor has accepted responsibility for providing the mitigation requirements listed herein.
- Signed copies of this document must be retained by the Permittee, Mitigation Sponsor, and in the USACE administrative
 records for both the permit and the Bank/ILF Instrument. It is the Permittee's responsibility to ensure that the District
 Project Manager (address below) is provided with a signed copy of this form.
- If changes are proposed to the type, amount, or location of mitigation after this form has been signed and returned to the District, the Sponsor must obtain case-by-case approval from the District Project Manager and/or North Carolina Interagency Review Team (NCIRT). If approved, higher mitigation ratios may be applied, as per current District guidance and a new version of this form must be completed and included in the District administrative records for both the permit and the Bank/ILF Instrument.

Comments/Additional Conditions:

This required mitigation is additional mitigation required for the subject project.

This form is not valid unless signed below by the District Project Manager and by the Mitigation Sponsor on Page 1. *Once signed, the Sponsor should provide copies of this form along with an updated bank ledger to: 1) the Permittee, 2) the District Project Manager at the address below, 3) the Bank Manager listed in RIBITS, and 4) the Wilmington District Mitigation Office, 3331 Heritage Trade Drive, Suite 105, Wake Forest, NC 27587 (or by email to SAWMIT@usace.army.mil)*. Questions regarding this form or any of the permit conditions may be directed to the District Mitigation Office.

USACE Project Manager: Eric Alsmeyer

US Army Corps of Engineers

3331 Heritage Trade Drive, Suite 105

Wake Forest, NC 27587

Email: eric.c.alsmeyer@usace.army.mil

Wilmington District Project Manager Signature

October 7, 2025

Date of Signature

Current Wilmington District mitigation guidance, including information on mitigation ratios, functional assessments, and mitigation bank location and availability, and credit classifications (including stream temperature and wetland groupings) is available at http://ribits.usace.army.mil.

COMPENSATORY MITIGATION RESPONSIBILITY ACCEPTANCE FORM

October 2, 2025

Permittee: NC DOT Turnpike Authority DWR Project #20181249 ver 24

Project Name: R-2829B: NC 540 County: Wake

The Division has received a Statement of Availability (SOA) from Wildlands Holdings III, LLC for the Falling Creek Mitigation Site to satisfy the additional mitigation requirements set forth in 401 Individual Certification 4179 issued to NC Turnpike Authority dated October 2, 2025 as provided in the table below.

	Compensatory Mitigation	River and 8-digit HUC Number
Riparian Wetland	+ 0.025 acres (credits)	Neuse River Basin
		03020201 HUC

The Permittee must provide a copy of this form to the Mitigation Provider specified above who will then sign the form to verify receipt of payment and the transfer of the mitigation responsibility. Once the Mitigation Provider has signed this form, it is the Permittee's responsibility to ensure that a signed copy of this form and the mitigation transfer certificate is submitted to DWR c/o Rob Ridings at rob.ridings@deq.nc.gov before conducting any of the authorized additional impacts.

The Mitigation Provider verifies that the mitigation requirements (credits) shown above, have been released and are available at the identified bank site(s). By signing below, the Mitigation Provider is accepting full responsibility for the identified mitigation. As a reminder to the Mitigation Provider, no more than 25 percent of the total mitigation required by Division can be met through preservation, unless requested and approved by the Division Director (15A NCAC 02H. 0506(c)(7) & 15A NCAC 2B.0295).

Signature Authority Name (print):	Daniel Johnson	
Daniel Johnson Signature:	Date:	10/06/2025
31g11ata1e	Date.	