

# STATE OF NORTH CAROLINA DIVISION OF HIGHWAYS

## COLUMBUS COUNTY

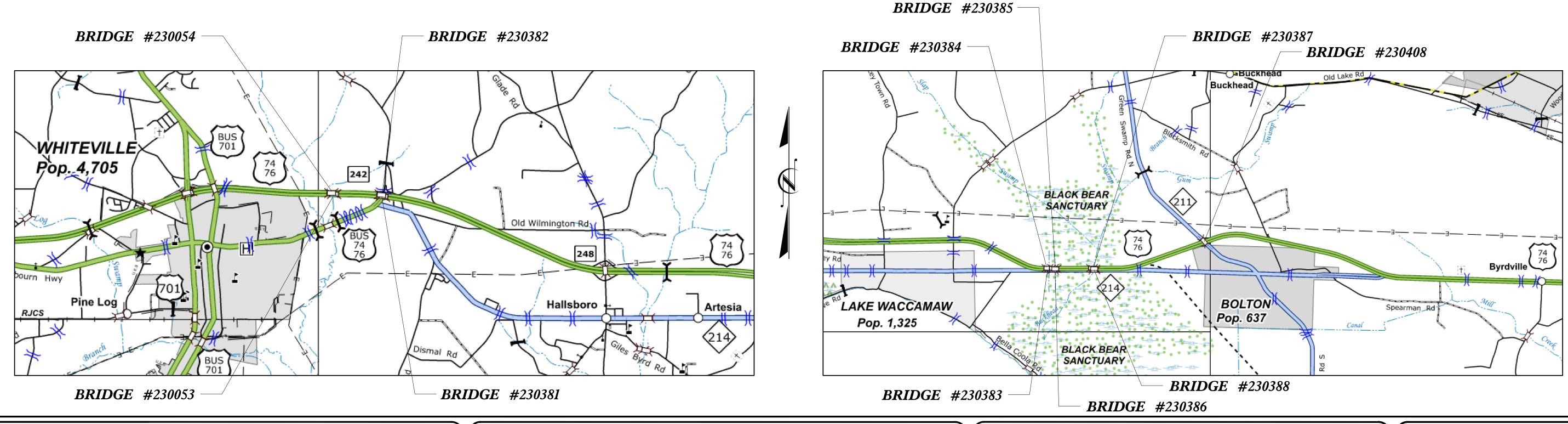
| STATE           | STAT    | TE PROJECT REFERENCE NO. | SHEET<br>NO. | TOTAL<br>SHEETS |  |
|-----------------|---------|--------------------------|--------------|-----------------|--|
| N.C.            |         | HI-0018                  | 1            | 79              |  |
| STATE PROJ. NO. |         | F. A. PROJ. NO.          | DESCRIPT     | ION             |  |
| 49989.1.1       |         | 0074(247)                | P.E.         |                 |  |
| 499             | 989.3.1 | 0074(247)                | CONS         | ST.             |  |

#### **LOCATION:**

BRIDGE #230053 ON US 74 / US 76 EBL OVER WHITE MARSH SWAMP
BRIDGE #230054 ON US 74 / US 76 WBL OVER WHITE MARSH SWAMP
BRIDGE #230381 ON US 74 / US 76 EBL OVER SR 1700 (RED HILL ROAD)
BRIDGE #230382 ON US 74 / US 76 WBL OVER SR 1700 (RED HILL ROAD)
BRIDGE #230383 ON US 74 / US 76 EBL OVER FRIAR SWAMP
BRIDGE #230384 ON US 74 / US 76 WBL OVER FRIAR SWAMP

BRIDGE #230385 ON US 74 / US 76 WBL OVER FRIAR SWAMP
BRIDGE #230386 ON US 74 / US 76 EBL OVER FRIAR SWAMP
BRIDGE #230387 ON US 74 / US 76 WBL OVER FRIAR SWAMP
BRIDGE #230388 ON US 74 / US 76 EBL OVER FRIAR SWAMP
BRIDGE #230408 ON NC 211 (GREEN SWAMP ROAD) OVER US 74 / US 76

TYPE OF WORK: BRIDGE REHABILITATION – DECK SURFACE PREPARATION AND POLYMER CONCRETE OVERLAY, SCARIFICATION OF
ASPHALT WEARING SURFACE, DECK REPAIRS, POLYMER CONCRETE OVERLAY, SILANE
DECK TREATMENT, JOINT REPAIRS, PAINTING EXISTING STRUCTURE, PAINTING
EXISTING WEATHERING STEEL STRUCTURE, SUBSTRUCTURE REPAIR, CONCRETE PILE
ENCAPSULATION, EPOXY COATING BENT CAPS



### **DESIGN DATA**COLUMBUS COUNTY

#230053 ADT 2021 = 16,500 #230385 ADT 2019 = 7,750 #230381 ADT 2021 = 16,500 #230386 ADT 2021 = 15,000 #230382 ADT 2021 = 16,500 #230388 ADT 2021 = 15,000 #230383 ADT 2021 = 16,500 #230384 ADT 2019 = 7,750

### PROJECT LENGTH COLUMBUS COUNTY

#230053 = 0.04 MILE #230385 = 0.04 MILE #230054 = 0.04 MILE #230386 = 0.04 MILE #230381 = 0.04 MILE #230387 = 0.03 MILE #230382 = 0.04 MILE #230388 = 0.03 MILE #230383 = 0.02 MILE #230408 = 0.04 MILE #230384 = 0.02 MILE



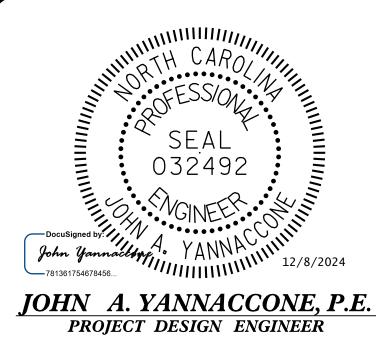
Suite 900 Suite 900 Raleigh,NC 27603 919-420-7660 NC Lic.No.F-0270

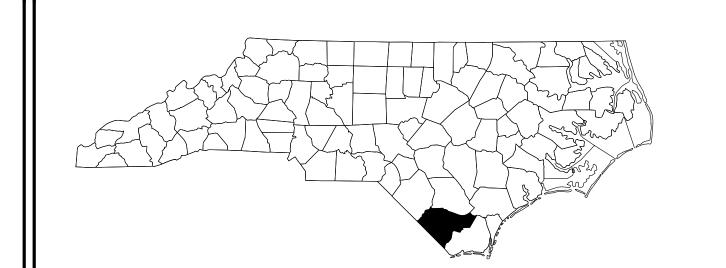
TIMOTHY M. SHERRILL, P.E.

NCDOT PROJECT ENGINEER

2024 STANDARD SPECIFICATIONS

LETTING DATE: FEBRUARY 18, 2025





## STATE OF NORTH CAROLINA DIVISION OF HIGHWAYS

### COLUMBUS COUNTY

| 1 | STATE | STA               | TE PROJECT REFERENCE NO. | SHEET<br>NO. | TOTAL<br>SHEETS |  |
|---|-------|-------------------|--------------------------|--------------|-----------------|--|
|   | N.C.  | -                 | HI-0018                  | 1A           | 79              |  |
|   | STATI | E PROJ. NO.       | F. A. PROJ. NO.          | DESCRIPTION  |                 |  |
|   | 49    | 989.1.1 0074(247) |                          | P.E          | •               |  |
|   | 499   | 989.3.1           | 0074(247)                | CONST.       |                 |  |
|   |       |                   |                          |              |                 |  |
|   |       |                   |                          |              |                 |  |
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|   |       |                   |                          |              |                 |  |
| ı |       |                   |                          |              |                 |  |

#### **LOCATION:**

*S4–07* 

BRIDGE #230053 ON US 74 / US 76 EBL OVER WHITE MARSH SWAMP
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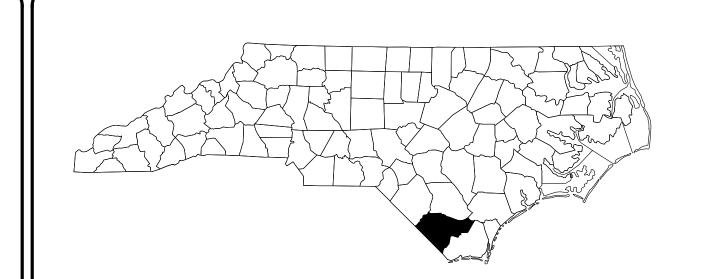
EXPANSION JOINT SEAL DETAILS

BRIDGE #230385 ON US 74 / US 76 WBL OVER FRIAR SWAMP
BRIDGE #230386 ON US 74 / US 76 EBL OVER FRIAR SWAMP
BRIDGE #230387 ON US 74 / US 76 WBL OVER FRIAR SWAMP
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EXISTING WEATHERING STEEL STRUCTURE, SUBSTRUCTURE REPAIR, CONCRETE PILE
ENCAPSULATION, EPOXY COATING BENT CAPS

#### INDEX OF DRAWINGS

| SHEET NO.      | DESCRIPTION                                 | SHEET NO.      | DESCRIPTION                                 |
|----------------|---|----------------|---|
| 1              | TITLE SHEET                                 |                |   |
| 1A TO 1B       | INDEX OF DRAWINGS                           |                | BRIDGE NO. 230383                           |
| S-1            | TOTAL BILL OF MATERIAL                      | S5-01 TO S5-02 | GENERAL DRAWINGS                            |
|                |   | <b>S</b> 5–03  | TYPICAL SECTION SURFACE PREPARATION DETAILS |
|                | BRIDGE NO. 230053                           | S5-04          | DECK REPAIRS                                |
| S1-01 TO S1-02 | GENERAL DRAWINGS                            | <b>S</b> 5–05  | ASPHALT PLUG JOINT DETAILS                  |
| <i>S1–03</i>   | TYPICAL SECTION SURFACE PREPARATION DETAILS | S5-06          | SUBSTRUCTURE REPAIR                         |
| S1-04 TO S1-05 | DECK REPAIRS                                |                | DDIDOE NO 222224                            |
| <i>S1–06</i>   | FOAM JOINT SEAL DETAILS                     |                | BRIDGE NO. 230384                           |
| <i>S1–07</i>   | APPROACH SLAB WIDENING DETAILS              | S6-01 TO S6-02 | GENERAL DRAWINGS                            |
|                | DDIDGE NO 3344                              | S6-03          | TYPICAL SECTION SURFACE PREPARATION DETAILS |
|                | BRIDGE NO. 230054                           | <i>S6–04</i>   | DECK REPAIRS                                |
| S2-01 TO S2-02 | GENERAL DRAWINGS                            | <b>S6-05</b>   | ASPHALT PLUG JOINT DETAILS                  |
| <b>S</b> 2-03  | TYPICAL SECTION SURFACE PREPARATION DETAILS | <i>S6-06</i>   | SUBSTRUCTURE REPAIR                         |
| S2-04 TO S2-05 | DECK REPAIRS                                |                | DDIDGE NO 220205                            |
| S2-06          | FOAM JOINT SEAL DETAILS                     |                | BRIDGE NO. 230385                           |
| <i>S2-07</i>   | SUBSTRUCTURE REPAIR                         | S7-01 TO S7-02 | GENERAL DRAWINGS                            |
|                | DDIDGE NO 22221                             | <b>S7–0</b> 3  | TYPICAL SECTION SURFACE PREPARATION DETAILS |
|                | BRIDGE NO. 230381                           | S7-04 TO S7-05 | DECK REPAIRS                                |
| S3-01 TO S3-02 | GENERAL DRAWINGS                            | <i>\$7–06</i>  | ASPHALT PLUG JOINT DETAILS                  |
| S3-03          | TYPICAL SECTION SURFACE PREPARATION DETAILS | <i>S7–07</i>   | SUBSTRUCTURE REPAIR                         |
| S3-04 TO S3-05 | DECK REPAIRS                                |                | DDIDCE NO 220206                            |
| S3-06          | FOAM JOINT SEAL DETAILS                     |                | BRIDGE NO. 230386                           |
| S3-07          | EXPANSION JOINT SEAL DETAILS                | S8-01 TO S8-02 | GENERAL DRAWINGS                            |
|                | DDIDCE NO 220202                            | <b>S</b> 8–03  | TYPICAL SECTION SURFACE PREPARATION DETAILS |
|                | BRIDGE NO. 230382                           | S8-04 TO S8-05 | DECK REPAIRS                                |
| S4-01 TO S4-02 | GENERAL DRAWINGS                            | <b>S</b> 8-06  | ASPHALT PLUG JOINT DETAILS                  |
| <b>S4-03</b>   | TYPICAL SECTION SURFACE PREPARATION DETAILS | S8-07 TO S8-08 | SUBSTRUCTURE REPAIR                         |
| S4-04 TO S4-05 | DECK REPAIRS                                |                |   |
| S4-06          | FOAM JOINT SEAL DETAILS                     |                |   |
| 0.4.4          |   |                |   |



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|-------|-----------|-----------------|-----------------|------|
| N.C.  |           | HI-0018         | 1B              | 79   |
| STATE | PROJ. NO. | F. A. PROJ. NO. | DESCRIPT        | TION |
| 499   | 989.1.1   | 0074(247)       | P.E             | •    |
| 499   | 89.3.1    | 0074(247)       | CON             | ST.  |
|       |           |                 |                 |      |
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#### INDEX OF DRAWINGS

| SHEET NO.        | <b>DESCRIPTION</b>                          |
|------------------|---|
|                  | BRIDGE NO. 230387                           |
| S9-01 TO S9-02   | GENERAL DRAWINGS                            |
| <b>S</b> 9–03    | TYPICAL SECTION SURFACE PREPARATION DETAILS |
| S9-04 TO S9-05   | DECK REPAIRS                                |
| S9-06            | ASPHALT PLUG JOINT DETAILS                  |
| <b>S9–07</b>     | SUBSTRUCTURE REPAIR                         |
|                  | BRIDGE NO. 230388                           |
| S10-01 TO S10-02 | GENERAL DRAWINGS                            |
| <b>S10–03</b>    | TYPICAL SECTION SURFACE PREPARATION DETAILS |
| S10-04 TO S10-05 | DECK REPAIRS                                |
| <i>S10–06</i>    | ASPHALT PLUG JOINT DETAILS                  |
| <i>\$10–07</i>   | SUBSTRUCTURE REPAIR                         |
|                  | BRIDGE NO. 230408                           |
| S11-01 TO S11-02 | GENERAL DRAWINGS                            |
| <i>\$11–03</i>   | TYPICAL SECTION SURFACE PREPARATION DETAILS |
| S11-04 TO S11-05 | DECK SURFACE REPAIR                         |
|                  | STANDARD DETAILS                            |
| SD-1             | TYPICAL CAP AND COLUMN REPAIR DETAILS       |
| SN               | STANDARD NOTES                              |

|               | TOTAL BILL OF MATERIAL           |                              |                                    |                                    |                      |                             |   |   |  |                      |                              |   |   |  |          |
|---------------|----------------------------------|------------------------------|------------------------------------|------------------------------------|----------------------|-----------------------------|---|---|--|----------------------|------------------------------|---|---|--|----------|
| BRIDGE<br>NO. | FLOATING<br>TURBIDITY<br>CURTAIN | GROOVING<br>BRIDGE<br>FLOORS | CLASS IB<br>SURFACE<br>PREPARATION | CLASS II<br>SURFACE<br>PREPARATION | SHOTCRETE<br>REPAIRS | EPOXY<br>RESIN<br>INJECTION | CLEANING<br>AND<br>REPAINTING<br>OF BRIDGE #_ | CLEANING AND PAINTING EXISTING WEATHERING STEEL FOR BRIDGE #_ | PAINTING<br>CONTAINMENT<br>FOR BRIDGE #_ | POLLUTION<br>CONTROL | APPROACH<br>SLAB<br>WIDENING | FOAM JOINT<br>SEALS FOR<br>PRESERVATION | EXPANSION<br>JOINT SEALS<br>FOR<br>PRESERVATION | ASPHALT PLUG<br>JOINTS FOR<br>PRESERVATION | PILE     |
|               | SQ. YDS.                         | SQ. FT.                      | SQ. YDS.                           | SQ. YDS.                           | CU. FT.              | LIN. FT.                    | LUMP SUM                                      | LUMP SUM  | LUMP SUM                                 | LUMP SUM             | LUMP SUM                     | LIN. FT.                                | LIN. FT.  | LIN. FT.                                   | LIN. FT. |
| 230053        |                                  | 8,783                        |                                    | 28.4                               |                      |                             | LUMP SUM                                      |   | LUMP SUM                                 | LUMP SUM             | LUMP SUM                     | 82.0                                    |   |  |          |
| 230054        |                                  | 8,626                        |                                    | 28.5                               |                      | 10.0                        | LUMP SUM                                      |   | LUMP SUM                                 | LUMP SUM             |                              | 82.0                                    |   |  |          |
| 230381        |                                  | 8,050                        |                                    | 13.6                               |                      |                             |   | LUMP SUM  | LUMP SUM                                 | LUMP SUM             |                              | 128.0                                   | 43.5  |  |          |
| 230382        |                                  | 7,902                        |                                    | 9.2                                |                      |                             |   | LUMP SUM  | LUMP SUM                                 | LUMP SUM             |                              | 85.0                                    | 87.0  |  |          |
| 230383        | 65.0                             |                              | 508.6                              |                                    |                      | -                           |   |   |  |                      |                              |   |   | 231.0                                      | 191.2    |
| 230384        | 95.0                             |                              | 508.6                              |                                    |                      |                             |   |   |  |                      |                              |   |   | 231.0                                      | 239.8    |
| 230385        | 50.0                             |                              | 928.6                              |                                    |                      |                             |   |   |  |                      |                              |   |   | 346.5                                      | 393.4    |
| 230386        | 45.0                             |                              | 928.6                              |                                    | 2.3                  |                             |   |   |  |                      |                              |   |   | 346.5                                      | 253.6    |
| 230387        | 45.0                             |                              | 648.6                              |                                    |                      | <u> </u>                    |   |   |  | <u> </u>             |                              |   |   | 269.5                                      | 200.4    |
| 230388        | 20.0                             |                              | 648.6                              |                                    |                      | <del></del>                 |   |   |  | <u> </u>             |                              |   |   | 269.5                                      | 125.0    |
| 230408        |                                  |                              |                                    |                                    |                      | <u> </u>                    |   |   |  | <u> </u>             |                              |   |   |  |          |
| TOTAL         | 320.0                            | 33,361                       | 4,171.6                            | 79.7                               | 2.3                  | 10.0                        | LUMP SUM                                      | LUMP SUM  | LUMP SUM                                 | LUMP SUM             | LUMP SUM                     | 377.0                                   | 130.5   | 1,694.0                                    | 1,403.4  |

| 4,1/1.6       | /9./  | 2.3  | 10.0             | LUMP SUM                     | LUMP SUM                       | LUMP SUM                                     | LUMP SUM                                  | LUMP SUM  | 3//.0                       |
|---------------|---|--|------------------|------------------------------|--------------------------------|--|---|---|-----------------------------|
|               |   |  | TO               | TAL BILL                     | OF MATER                       | IAL  |   |   |                             |
| BRIDGE<br>NO. | POLYESTER<br>POLYMER<br>CONCRETE<br>MATERIALS | EPOXY POLYMER CONCRETE MATERIALS (ALTERNATE) | EPOXY<br>COATING | SCARIFYING<br>BRIDGE<br>DECK | SHOTBLASTING<br>BRIDGE<br>DECK | CONCRETE<br>DECK REPAIR<br>FOR PC<br>OVERLAY | PLACING<br>AND<br>FINISHING<br>PC OVERLAY | BRIDGE DECK<br>WATERPROOFING<br>MEMBRANE-SPRAY<br>APPLIED | SILANE<br>DECK<br>TREATMENT |
|               | CU. YDS.                                      | CU. YDS.                                     | SQ. FT.          | SQ. YDS.                     | SQ. YDS.                       | SQ. YDS.                                     | SQ. YDS.                                  | SQ. YDS.  | SQ. YDS.                    |
|               |   |  |                  |                              |                                |  |   |   |                             |
| 230053        | 34.4  | 34.4   |                  | 993.8                        | 993.8                          | 35.6   | 993.8                                     |   |                             |
| 230054        | 36.3  | 36.3   |                  | 1,044.9                      | 1,044.9                        | 28.6   | 1,044.9                                   |   |                             |
| 230381        | 34.4  | 34.4   | 294              | 985.4                        | 985.4                          | 14.1   | 985.4                                     |   |                             |
| 230382        | 33.7  | 33.7   | 294              | 964.4                        | 964.4                          | 9.4  | 964.4                                     |   |                             |
| 230383        |   |  |                  |                              |                                |  |   | 440.6   |                             |
| 230384        |   |  |                  |                              |                                |  |   | 440.6   |                             |
| 230385        |   |  |                  |                              |                                |  |   | 860.6   |                             |
| 230386        |   |  |                  |                              |                                |  |   | 860.6   |                             |
| 230387        |   |  |                  |                              |                                |  |   | 580.6   |                             |
| 230388        |   |  |                  |                              |                                |  |   | 580.6   |                             |
| 230408        |   |  |                  |                              | 1,447.6                        |  |   |   | 1,447.6                     |
| TOTAL         | 138.8   | 138.8  | 588              | 3,988.5                      | 5,436.1                        | 87.7   | 3,988.5                                   | 3,763.6   | 1,447.6                     |

#### NOTE:

AT THE TIME OF THESE PLANS. IT WAS NOT ANTICIPATED THAT THE ITEM(S) LISTED BELOW WOULD BE REQUIRED. HOWEVER, IT MAY BE DETERMINED IN THE FIELD THAT THE FOLLOWING ITEM(S) LISTED, OR OTHER WORK WILL BE NECESSARY TO PROPERLY COMPLETE THE INTENDED BRIDGE PRESERVATION/REHABILITATION WORK. THE CONTRACTOR SHALL BE PREPARED TO PERFORM SUCH WORK IN A TIMELY MANNER, AS DETERMINED IN THE FIELD. SUCH WORK SHALL BE CONSIDERED EXTRA WORK AND SHALL BE ADDRESSED AS PER ARTICLE 104-7 OF THE STANDARD SPECIFICATIONS. PROJECT SPECIAL PROVISIONS THAT OUTLINE REQUIREMENTS FOR THESE POTENTIAL ADDITIONAL WORK ITEMS HAVE BEEN PROVIDED IN THE PROJECT DOCUMENTS, BUT NO QUANTITIES HAVE BEEN LISTED. ACTUAL PAY ITEMS, QUANTITIES, AND COSTS WILL BE ESTABLISHED, AS REQUIRED, IF EXTRA WORK IN ENCOUNTERED.

**UNANTICIPATED ITEMS:** 

CLASS III SURFACE PREPARATION VOLUMETRIC MIXER



PROJECT NO. HI-0018

**COLUMBUS** 

230053, 230054,

BRIDGE NO. 230381, 230382, 230383, 230386

230384, 230385, 230386, 230387, 230388, 230408

STATE OF NORTH CAROLINA

DEPARTMENT OF TRANSPORTATION

RALEIGH

TOTAL BILL OF MATERIAL



| DOCUMENT NOT CONSIDERED<br>FINAL UNLESS ALL | Ī |
|---|---|
| FINAL UNLESS ALL<br>SIGNATURES COMPLETED    | ŀ |
| 0 1 0 1 W 1 0 1 (20 0 0 W 1 2 2 1 2 5       | 5 |

|    |     |     | REVIS | SIO | NS  |       | SHEET         |
|----|-----|-----|-------|-----|-----|-------|---------------|
| .D | NO. | BY: | DATE: | NO. | BY: | DATE: | S-1           |
|    | 1   |     |       | 3   |     |       | TOTA<br>SHEET |
|    | 2   |     |       | 4   |     |       | 79            |

DRAWN BY:

CHECKED BY:

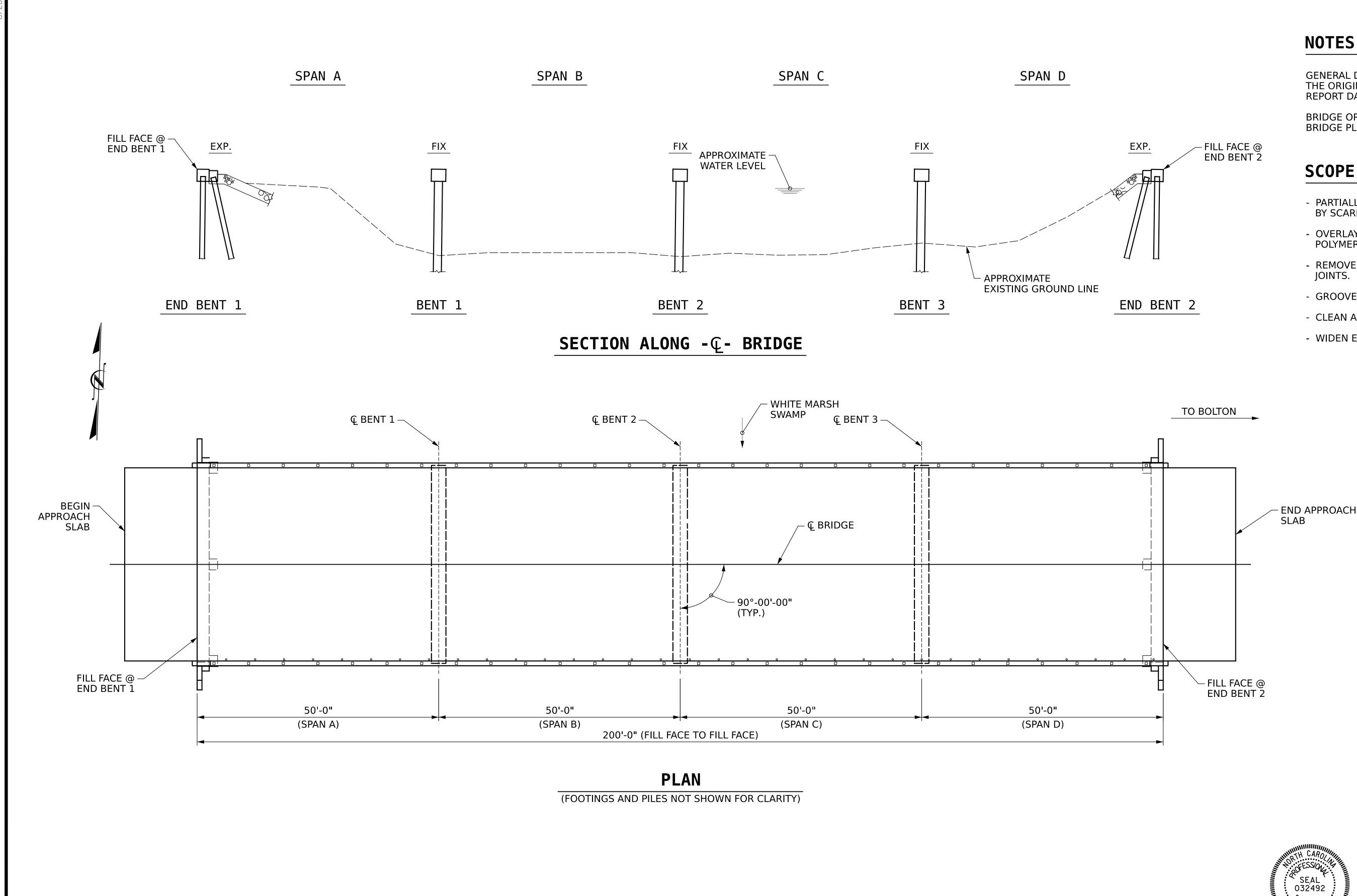
R.L.PUTEK

DATE: 08/2024

DATE: 08/2024

R.L.PUTEK J.A.YANNACCONE

DRAWN BY : CHECKED BY : \_ DATE : 08/2024 \_ DATE : 08/2024



I HEREBY CERTIFY THAT THIS STRUCTURE WAS REHABILITATED ACCORDING TO THESE PLANS OR AS NOTED HEREIN.

RESIDENT ENGINEER

DATE

#### NOTES:

GENERAL DRAWING INFORMATION IS TAKEN FROM THE ORIGINAL PLANS AND THE ROUTINE INSPECTION REPORT DATED 06/01/2023.

BRIDGE ORIENTATION CONFORMS TO THE EXISTING BRIDGE PLANS AND ROUTINE INSPECTION REPORT.

#### SCOPE OF WORK:

- PARTIALLY REMOVE TOP OF BRIDGE DECK CONCRETE BY SCARIFICATION AND SHOTBLASTING METHODS.
- OVERLAY PREPARED TOP OF BRIDGE DECK WITH POLYMER CONCRETE (PC).
- REMOVE EXISTING JOINT MATERIAL AND INSTALL FOAM
- GROOVE PC BRIDGE DECK.
- CLEAN AND PAINT EXISTING STRUCTURAL STEEL BEAMS.
- WIDEN EXISTING APPROACH SLABS.

**HI-0018** PROJECT NO.\_

**COLUMBUS** 

COUNTY 230053

BRIDGE NO.\_

SHEET 1 OF 2

STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION

#### GENERAL DRAWING

FOR BRIDGE ON US 74 - US 76 BYP EBL OVER WHITE MARSH SWAMP

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

REVISIONS NO. BY: S1-01 DATE: DATE: TOTAL SHEETS 79



#### LOCATION SKETCH

INFORMATION INDICATED ON THE LOCATION SKETCH SHALL BE CONSIDERED GENERAL INFORMATION ONLY. CONTRACTOR SHALL CONFIRM, THROUGH OTHER SOURCES, SPECIFIC INFORMATION REGARDING BRIDGES, ROADWAY, UTILITIES, THE SURROUNDING AREA, AND ANY OTHER ASPECTS THAT MAY BE NECESSARY TO PERFORM AND COMPLETE THE PROJECT.

| BRIDGE CO       | ORDINATES       |
|-----------------|-----------------|
| LATITUDE        | LONGITUDE       |
| 34°-20'-58.63'' | 78°-40'-16.51'' |

| SAMPLE BAR<br>REPLACEMENT |         |  |  |  |  |  |  |
|---------------------------|---------|--|--|--|--|--|--|
| SIZE                      | LENGTH  |  |  |  |  |  |  |
| #3                        | 6'-2"   |  |  |  |  |  |  |
| #4                        | 7'-4"   |  |  |  |  |  |  |
| #5                        | 8'-6"   |  |  |  |  |  |  |
| #6                        | 9'-8"   |  |  |  |  |  |  |
| #7                        | 10'-10" |  |  |  |  |  |  |
| #8                        | 12'-0"  |  |  |  |  |  |  |
| #9                        | 13'-2"  |  |  |  |  |  |  |
| #10                       | 14'-6"  |  |  |  |  |  |  |
| #11                       | 15'-10" |  |  |  |  |  |  |

NOTE: SAMPLE BAR REPLACEMENT LENGTHS BASED ON 30" (SAMPLE LENGTH) PLUS TWO SPLICE LENGTHS AND  $f_V = 60 \text{ksi.}$ 

#### **GENERAL NOTES**

SEE CONTRACT DOCUMENTS FOR LANE WIDTHS, SEQUENCING AND OTHER TRAFFIC CONTROL MEASURES FOR STAGING OF OVERLAY SURFACE PREPARATION AND POLYMER CONCRETE (PC) PLACEMENT. THE BRIDGE SURFACE AND/OR TRAFFIC.

THE CONTRACTOR'S ATTENTION IS CALLED TO THE FACT THAT DUE TO THE NATURE OF PRESERVATION PROJECTS, THE EXTENT OF WORK CANNOT ALWAYS BE ACCURATELY DETERMINED PRIOR TO COMMENCEMENT OF WORK. REPAIR LOCATIONS AND ESTIMATES OF QUANTITIES ARE GIVEN WITH THE BEST INFORMATION AVAILABLE. IF ADDITIONAL REPAIRS NOT SHOWN ON THE DRAWINGS ARE DEEMED NECESSARY BY THE ENGINEER, THE ENGINEER SHALL NOTE ON THE DRAWINGS THE APPROXIMATE LOCATION AND DESCRIPTION OF THE REPAIR.

EXISTING DIMENSIONS AND BRIDGE CONDITION ARE FROM THE BEST INFORMATION AVAILABLE. THE CONTRACTOR SHALL FIELD VERIFY THE INFORMATION SHOWN ON THE PLANS AND NOTIFY THE ENGINEER IF ACTUAL DIMENSIONS AND CONDITIONS DIFFER.

THE CONTRACTOR SHALL HAVE NO CLAIM WHATSOEVER AGAINST THE DEPARTMENT FOR ANY DELAYS OR ADDITIONAL COST INCURRED BASED ON DIFFERENCES BETWEEN WHAT IS SHOWN ON THE PLANS AND THE ACTUAL CONDITIONS AT THE PROJECT SITE.

IT IS THE CONTRACTOR'S RESPONSIBILITY TO FOLLOW ALL STATE AND FEDERAL SAFETY REQUIREMENTS.

WORK ON THE BRIDGE SHALL BE PERFORMED SO AS NOT TO ALLOW DEBRIS TO FALL BELOW, EXCEPT WHERE THE CONTRACTOR'S PLAN USED PLATFORMS, NETS, SCREEN OR OTHER PROTECTIVE DEVICES TO CATCH THE MATERIAL. THE CONTRACTOR SHALL SUBMIT PLANS FOR CONSTRUCTION IN ACCORDANCE WITH ARTICLE 402-2 OF THE STANDARD SPECIFICATIONS AND THE PROJECT SPECIAL PROVISIONS. ANY DAMAGE TO EXISTING REINFORCING STEEL DURING CONTRACTOR'S OPERATIONS SHALL BE REPAIRED AS DIRECTED BY THE ENGINEER AND PERFORMED AT NO ADDITIONAL COST TO THE DEPARTMENT.

FOR CONTROL OF TRAFFIC AND LIMITS OF PHASING OF CONSTRUCTION, SEE CONTRACT DOCUMENTS.

INASMUCH AS THE PAINT SYSTEM ON THE EXISTING STRUCTURAL STEEL CONTAINS LEAD, THE CONTRACTOR'S ATTENTION IS DIRECTED TO ARTICLE 107-1 OF THE STANDARD SPECIFICATIONS. ANY COSTS RESULTING FROM COMPLIANCE WITH APPLICABLE STATE OR FEDERAL REGULATIONS PERTAINING TO HANDLING OF MATERIALS CONTAINING LEAD BASED PAINT SHALL BE INCLUDED IN THE BID PRICE FOR ITEMS ASSOCIATED WITH THE CLEANING AND REPAINTING OF BRIDGE.

THE CONTRACTOR SHALL PROVIDE INDEPENDENT ASSURANCE SAMPLES OF REINFORCING STEEL AS FOLLOWS: FOR PROJECTS REQUIRING UP TO 400 TONS OF REINFORCING STEEL, ONE 30 INCH SAMPLE OF EACH SIZE BAR USED, AND FOR PROJECTS REQUIRING OVER 400 TONS OF REINFORCING STEEL, TWO 30 INCH SAMPLES OF EACH SIZE BAR USED. THE SAMPLE BARS SHOULD COME FROM STEEL ACTUALLY USED IN THE PROJECT, AND THE SAMPLE BARS SHOULD BE REPLACED BY SPLICED BARS AS SPECIFIED IN THE SAMPLE BAR REPLACEMENT CHART. PAYMENT FOR THE SAMPLE BARS AND REPLACEMENT REINFORCING STEEL SHALL BE CONSIDERED INCIDENTAL TO VARIOUS PAY ITEMS.

PRIOR TO BEGINNING WORK, THE CONTRACTOR SHALL SUBMIT FOR REVIEW AND APPROVAL A COMPLETE SEQUENCE OF TASKS FOR EACH OPERATION AFFECTING

FOR OTHER DESIGN DATA AND GENERAL NOTES, SEE SHEET SN.

FOR FALSEWORK AND FORMWORK, SEE SPECIAL PROVISIONS.

FOR SUBMITTAL OF WORKING DRAWINGS, SEE SPECIAL PROVISIONS.

FOR CRANE SAFETY, SEE SPECIAL PROVISIONS.

FOR GROUT FOR STRUCTURES, SEE SPECIAL PROVISIONS.

ALL PAVEMENT MARKING WILL BE IN ACCORDANCE WITH THE CONTRACT DOCUMENTS.

EXISTING JOINTS AND DECK DRAINS SHALL BE SEALED PRIOR TO BEGINNING SURFACE PREPARATIONS OF THE BRIDGE DECK. THE CONTRACTOR SHALL TAKE CARE THAT ANY CONSTRUCTION DEBRIS THAT COLLECTS IN THE DRAINS IS CONTAINED. DRAINS IN SHOULDERS OF ADJACENT TRAVEL LANES SHALL BE KEPT FREE AND CLEAR OF DEBRIS.

LONGITUDINAL CONSTRUCTION JOINTS OF OVERLAYS SHALL BE LOCATED ALONG THE CENTERLINE OR EDGE OF TRAVEL LANES.

FOR SCARIFYING BRIDGE DECK, SHOTBLASTING BRIDGE DECK AND CLASS II SURFACE PREPARATION, SEE OVERLAY SURFACE PREPARATION FOR POLYMER CONCRETE SPECIAL PROVISION.

FOR CONCRETE DECK REPAIR FOR PC OVERLAY, PC MATERIALS, AND PLACING AND FINISHING PC OVERLAY, SEE POLYMER CONCRETE BRIDGE DECK OVERLAY SPECIAL PROVISION.

FOR POLLUTION CONTROL AND PAINTING CONTAINMENT SEE PAINTING EXISTING STRUCTURE SPECIAL PROVISION.

FOR PAINTING EXISTING STRUCTURE, SEE SPECIAL PROVISIONS.

FOR FOAM JOINT SEALS FOR PRESERVATION, SEE SPECIAL PROVISIONS.

FOR APPROACH SLAB WIDENING, SEE SPECIAL PROVISIONS.

> **HI-0018** PROJECT NO. **COLUMBUS** COUNTY

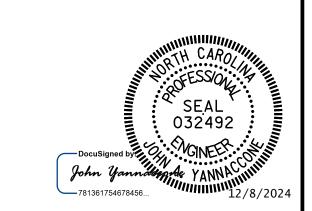
230053 BRIDGE NO.

SHEET 2 OF 2

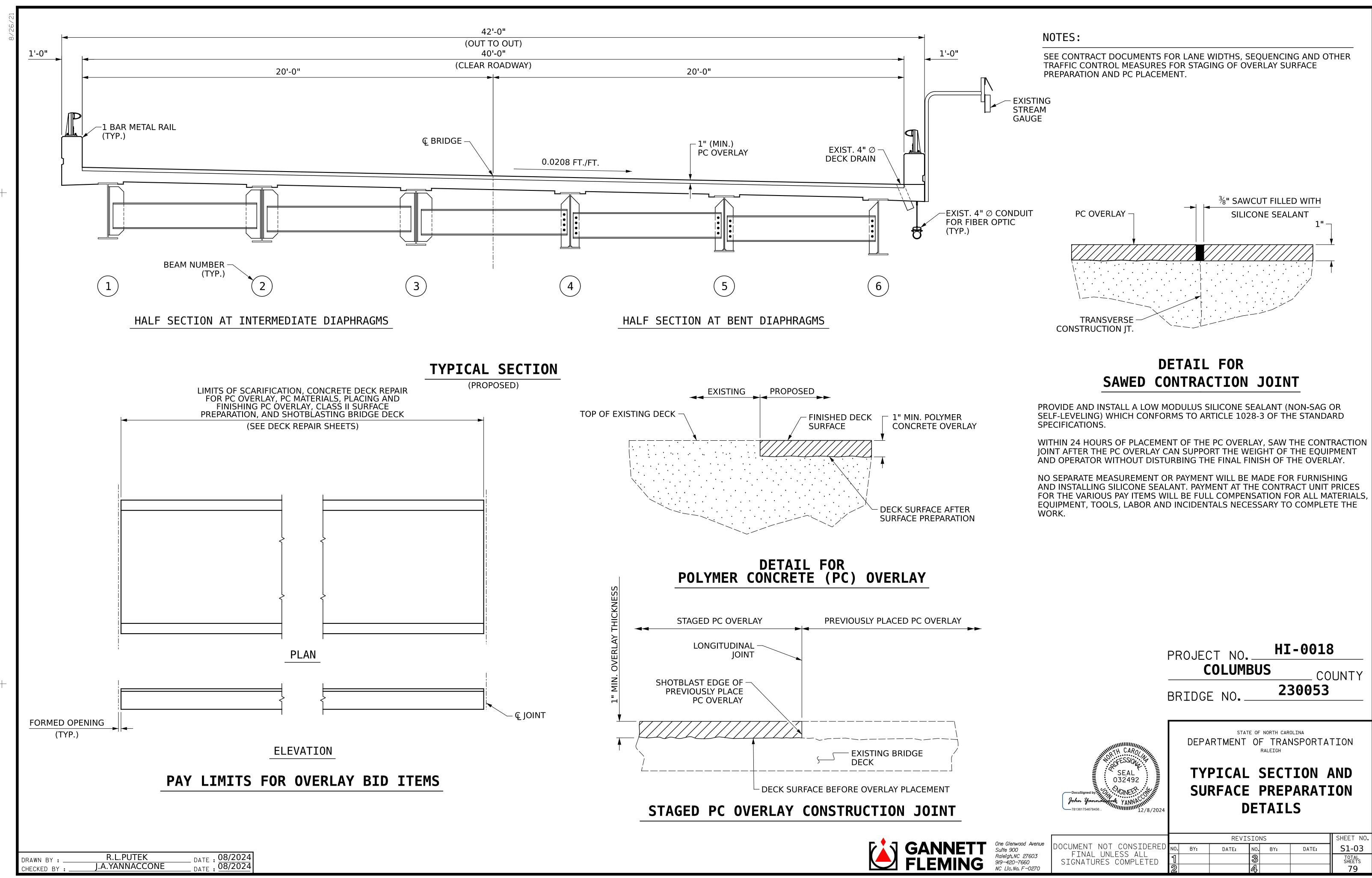
STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION RALEIGH

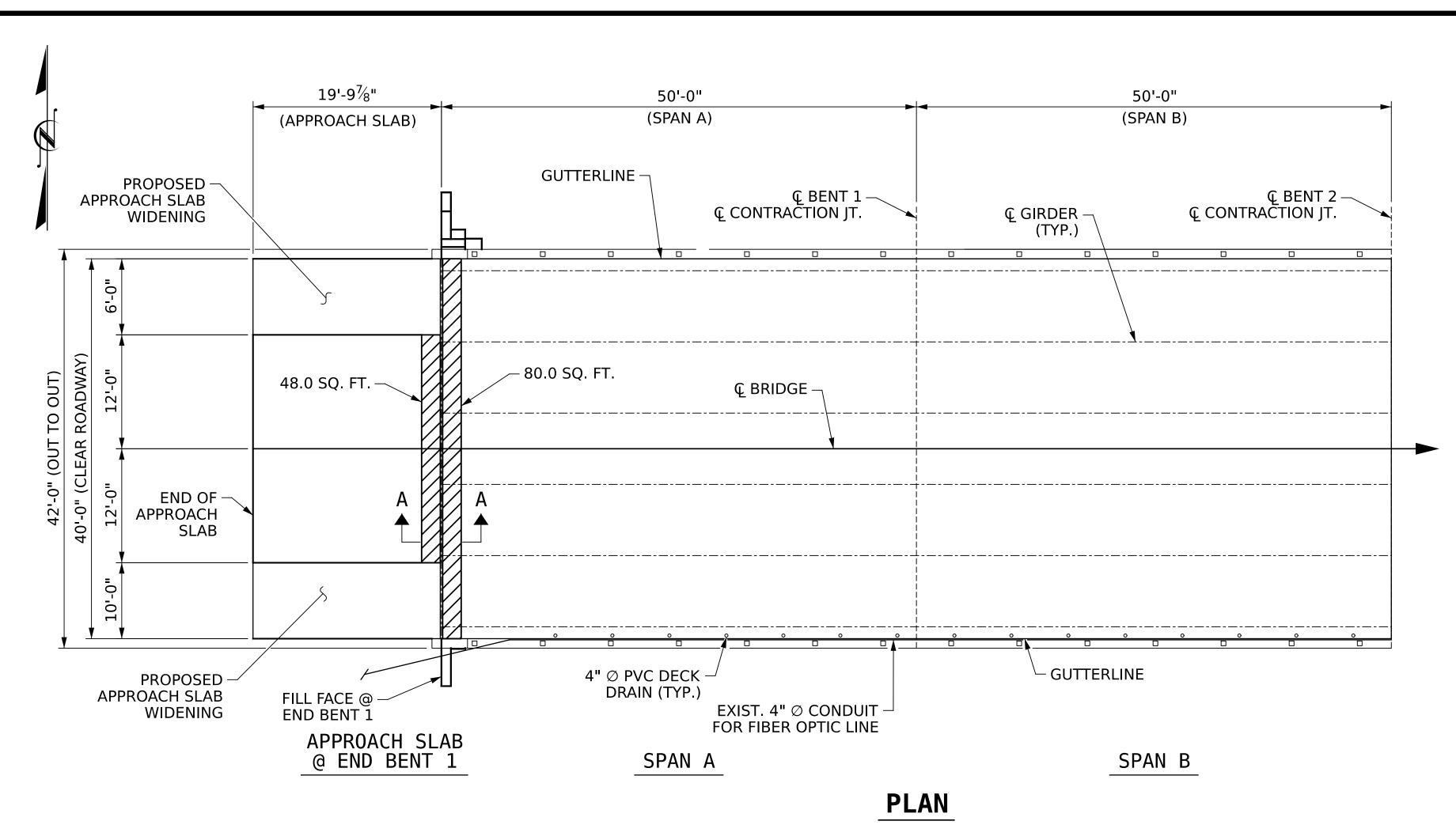
#### GENERAL DRAWING

FOR BRIDGE ON US 74 - US 76 BYP EBL OVER WHITE MARSH SWAMP









#### **NOTES**

REPAIR LOCATIONS AND ESTIMATED QUAINTITIES ARE GIVEN WITH THE BEST INFORMATION AVAILABLE. IF ADDITIONAL REPAIRS NOT SHOWN ON THE DRAWINGS ARE DEEMED NECESSARY BY THE ENGINEER, THE ENGINEER WILL NOTE ON THE DRAWINGS THE APPROXIMATE LOCATIONS AND DESCRIPTION OF THE REPAIRS AND ADJUST THE ACTUAL QUAINTITIES ENTERED INTO THE REPAIR QUAINTITY TABLE.

PAYMENT FOR CLASS II SURFACE PREPARATION IS BASED UPON SQUARE YARDS OF ADDITIONAL DEMOLITION REQUIRED FOLLOWING SCARIFICATION OF BRIDGE DECK, SEE OVERLAY SURFACE PREPARATION FOR POLYMER CONCRETE SPECIAL PROVISION.

CONCRETE COVER FOR TOP BARS IN DECK SLAB IS  $1\frac{1}{2}$ " PER EXISTING BRIDGE PLANS.

FOR SECTION A-A. SEE "FOAM JOINT SEAL DETAILS" SHEET.

FOR CONTRACTION JOINTS, SEE "TYPICAL SECTION AND SURFACE PREPARATION" SHEET.

FOR PROPOSED APPROACH SLAB WIDENING, SEE "APPROACH SLAB WIDENING DETAILS" SHEET.

| AS-BU             | JILT QUANTIT | Y REP      | AIR TA       | BLE             |              |
|-------------------|--------------|------------|--------------|-----------------|--------------|
|                   | DECK UNDERSI | DE REPA    | IR           |                 |              |
|                   |              | EST        | IMATE        | AC <sup>-</sup> | ΓUAL         |
| SHOTCRETE REPAIRS |              | AREA<br>SF | VOLUME<br>CF | AREA<br>SF      | VOLUME<br>CF |
| UNDERSIDE         | SPAN A       | 0.0        | 0.0          |                 |              |
| OF DECK           | SPAN B       | 0.0        | 0.0          |                 |              |
| INTERIOR          | SPAN A       | 0.0        | 0.0          |                 |              |
| DIAPHRAGMS        | SPAN B       | 0.0        | 0.0          |                 |              |
| OVERHANG          | SPAN A       | 0.0        | 0.0          |                 |              |
| DIAPHRAGMS        | SPAN B       | 0.0        | 0.0          |                 |              |
| UNDERSIDE         | SPAN A       | 0.0        | 0.0          |                 |              |
| OF OVERHANG       | SPAN B       | 0.0        | 0.0          |                 |              |
|                   |              |            | ESTIMATE     | Δ               | CTUAL        |
| UNDERSIDE EPOXY   | SPAN A       |            | 0.0 LIN.FT   |                 |              |
| RESIN INJECTION   | SPAN B       |            | 0.0 LIN.FT   |                 |              |

#### AS-BUILT QUANTITY REPAIR TABLE

DECK SURFACE REPAIR & APPROACH SLAB REPAIR

|                              |                            | ESTIMATE       | ACTUAL |
|------------------------------|----------------------------|----------------|--------|
|                              | APPROACH SLAB @ END BENT 1 | 52.6 SQ. YDS.  |        |
| SCARIFYING                   | SPAN A                     | 222.2 SQ. YDS. |        |
| BRIDGE<br>DECK               | SPAN B                     | 222.2 SQ. YDS. |        |
|                              |                            |                |        |
|                              | APPROACH SLAB @ END BENT 1 | 52.6 SQ. YDS.  |        |
| SHOTBLASTING<br>BRIDGE       | SPAN A                     | 222.2 SQ. YDS. |        |
| DECK                         | SPAN B                     | 222.2 SQ. YDS. |        |
|                              |                            |                |        |
|                              | APPROACH SLAB @ END BENT 1 | 5.3 SQ. YDS.   |        |
| CLASS II<br>SURFACE          | SPAN A                     | 8.9 SQ. YDS.   |        |
| PREPARATION                  | SPAN B                     | 0.0 SQ. YDS.   |        |
|                              |                            |                |        |
|                              | APPROACH SLAB @ END BENT 1 | 1.8 CU. YDS.   |        |
| PC .                         | SPAN A                     | 7.7 CU. YDS.   |        |
| MATERIALS                    | SPAN B                     | 7.7 CU. YDS.   |        |
|                              |                            |                |        |
|                              | APPROACH SLAB @ END BENT 1 | 52.6 SQ. YDS.  |        |
| PLACING AND<br>FINISHING     | SPAN A                     | 222.2 SQ. YDS. |        |
| PC OVERLAY                   | SPAN B                     | 222.2 SQ. YDS. |        |
|                              |                            |                |        |
| GROOVING<br>BRIDGE<br>FLOORS | APPROACH SLAB @ END BENT 1 | 717 SQ. FT.    |        |
|                              | SPAN A                     | 1838 SQ. FT.   |        |
|                              | SPAN B                     | 1838 SQ. FT.   |        |
|                              |                            |                |        |

SCARIFICATION AND SHOTBLASTING OF BRIDGE DECK

CLASS II SURFACE PREPARATION

UNDERSIDE OF DECK SHOTCRETE REPAIRS

PROJECT NO. HI-0018

COLUMBUS COUNTY

BRIDGE NO. 230053

SHEET 1 OF 2

STATE OF NORTH CAROLINA

DEPARTMENT OF TRANSPORTATION

RALEIGH

DECK REPAIRS

SPAN A W/ APPROACH SLAB
AND SPAN B

S1-04

TOTAL SHEETS **79** 

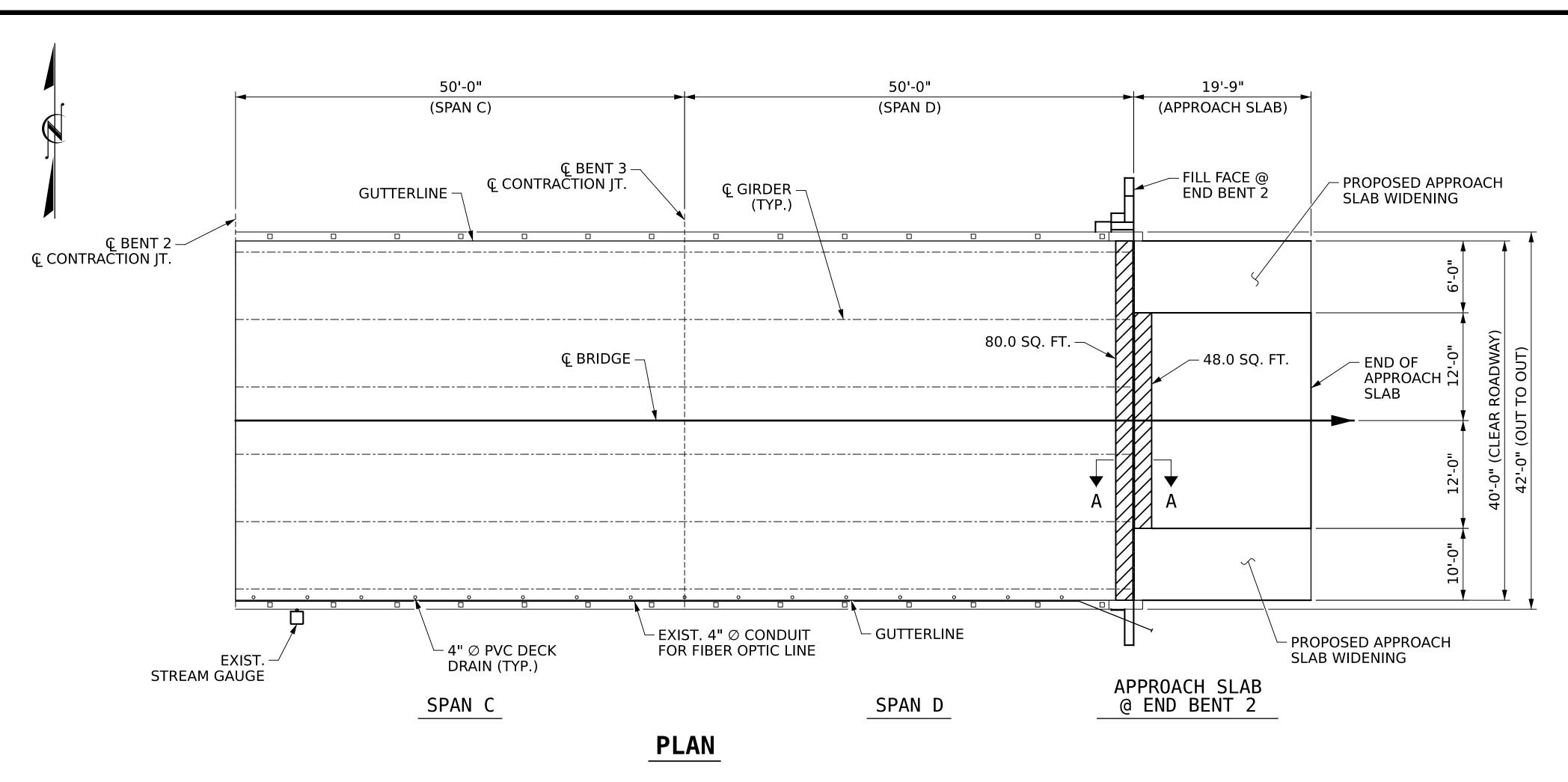
REVISIONS

DOCUMENT NOT CONSIDERED NO. BY: DATE: NO. BY: DATE: SIGNATURES COMPLETED

Docusigned by: 101 NGINEER ON John Yannabana YANNACHINI 12/8/2024



| RAWN BY :     | R.L.PUTEK      | DATE , 08/2024                                 |
|---------------|----------------|--|
| HECKED BY : _ | J.A.YANNACCONE | $\frac{1}{10000000000000000000000000000000000$ |



#### **NOTES**

REPAIR LOCATIONS AND ESTIMATED QUAINTITIES ARE GIVEN WITH THE BEST INFORMATION AVAILABLE. IF ADDITIONAL REPAIRS NOT SHOWN ON THE DRAWINGS ARE DEEMED NECESSARY BY THE ENGINEER, THE ENGINEER WILL NOTE ON THE DRAWINGS THE APPROXIMATE LOCATIONS AND DESCRIPTION OF THE REPAIRS AND ADJUST THE ACTUAL QUAINTITIES ENTERED INTO THE REPAIR QUAINTITY TABLE.

PAYMENT FOR CLASS II SURFACE PREPARATION IS BASED UPON SQUARE YARDS OF ADDITIONAL DEMOLITION REQUIRED FOLLOWING SCARIFICATION OF BRIDGE DECK, SEE OVERLAY SURFACE PREPARATION FOR POLYMER CONCRETE SPECIAL PROVISION.

CONCRETE COVER FOR TOP BARS IN DECK SLAB IS  $1\frac{1}{2}$ " PER EXISTING BRIDGE PLANS.

FOR SECTION A-A. SEE "FOAM JOINT SEAL DETAILS" SHEET.

FOR CONTRACTION JOINTS, SEE "TYPICAL SECTION AND SURFACE PREPARATION" SHEET.

FOR PROPOSED APPROACH SLAB WIDENING, SEE "APPROACH SLAB WIDENING DETAILS" SHEET.

| AS-BUILT QUANTITY REPAIR TABLE |              |            |              |                 |              |  |
|--------------------------------|--------------|------------|--------------|-----------------|--------------|--|
|                                | DECK UNDERSI | DE REPA    | IR           |                 |              |  |
|                                |              | EST        | IMATE        | AC <sup>-</sup> | TUAL         |  |
| SH0TCRET                       | E REPAIRS    | AREA<br>SF | VOLUME<br>CF | AREA<br>SF      | VOLUME<br>CF |  |
| UNDERSIDE<br>OF DECK           | SPAN C       | 0.0        | 0.0          |                 |              |  |
|                                | SPAN D       | 0.0        | 0.0          |                 |              |  |
| INTERIOR                       | SPAN C       | 0.0        | 0.0          |                 |              |  |
| DIAPHRAGMS                     | SPAN D       | 0.0        | 0.0          |                 |              |  |
| OVERHANG                       | SPAN C       | 0.0        | 0.0          |                 |              |  |
| DIAPHRAGMS                     | SPAN D       | 0.0        | 0.0          |                 |              |  |
| UNDERSIDE                      | SPAN C       | 0.0        | 0.0          |                 |              |  |
| OF OVERHANG                    | SPAN D       | 0.0        | 0.0          |                 |              |  |
|                                |              |            | ESTIMATE     | . A             | CTUAL        |  |
| UNDERSIDE EPOXY                | SPAN C       |            | 0.0 LIN.FT   |                 |              |  |
| RESIN INJECTION                | SPAN D       |            | 0.0 LIN.FT   |                 |              |  |

#### AS-BUILT QUANTITY REPAIR TABLE

DECK SURFACE REPAIR & APPROACH SLAB REPAIR

| 520.                    | t som nee her nem a ni me  | ACT SEAS TO    | (21)   |
|-------------------------|----------------------------|----------------|--------|
|                         |                            | ESTIMATE       | ACTUAL |
|                         |                            |                |        |
| SCARIFYING              | SPAN C                     | 222.2 SQ. YDS. |        |
| BRIDGE<br>DECK          | SPAN D                     | 222.2 SQ. YDS. |        |
|                         | APPROACH SLAB @ END BENT 2 | 52.4 SQ. YDS.  |        |
|                         |                            |                |        |
| SHOTBLASTING<br>BRIDGE  | SPAN C                     | 222.2 SQ. YDS. |        |
| DECK                    | SPAN D                     | 222.2 SQ. YDS. |        |
|                         | APPROACH SLAB @ END BENT 2 | 52.4 SQ. YDS.  |        |
|                         |                            |                |        |
| CLASS II                | SPAN C                     | 0.0 SQ. YDS.   |        |
| SURFACE<br>PREPARATION  | SPAN D                     | 8.9 SQ. YDS.   |        |
|                         | APPROACH SLAB @ END BENT 2 | 5.3 SQ. YDS.   |        |
|                         |                            |                |        |
| PC                      | SPAN C                     | 7.7 CU. YDS.   |        |
| MATERIALS               | SPAN D                     | 7.7 CU. YDS.   |        |
|                         | APPROACH SLAB @ END BENT 2 | 1.8 CU. YDS.   |        |
|                         |                            |                |        |
| PLACING AND             | SPAN C                     | 222.2 SQ. YDS. |        |
| FINISHING<br>PC OVERLAY | SPAN D                     | 222.2 SQ. YDS. |        |
|                         | APPROACH SLAB @ END BENT 2 | 52.4 SQ. YDS.  |        |
|                         |                            |                |        |
| GROOVING                | SPAN C                     | 1838 SQ. FT.   |        |
| BRIDGE<br>FLOORS        | SPAN D                     | 1838 SQ. FT.   |        |
|                         | APPROACH SLAB @ END BENT 2 | 714 SQ. FT.    |        |

SCARIFICATION AND SHOTBLASTING OF BRIDGE DECK

CLASS II SURFACE PREPARATION

UNDERSIDE OF DECK SHOTCRETE REPAIRS

**HI-0018** PROJECT NO.\_ **COLUMBUS** COUNTY

230053 BRIDGE NO.\_

SHEET 2 OF 2

STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION RALEIGH

S1-05

TOTAL SHEETS

79

DATE:

**DECK REPAIRS** SPAN C AND SPAN D

W/ APPROACH SLAB



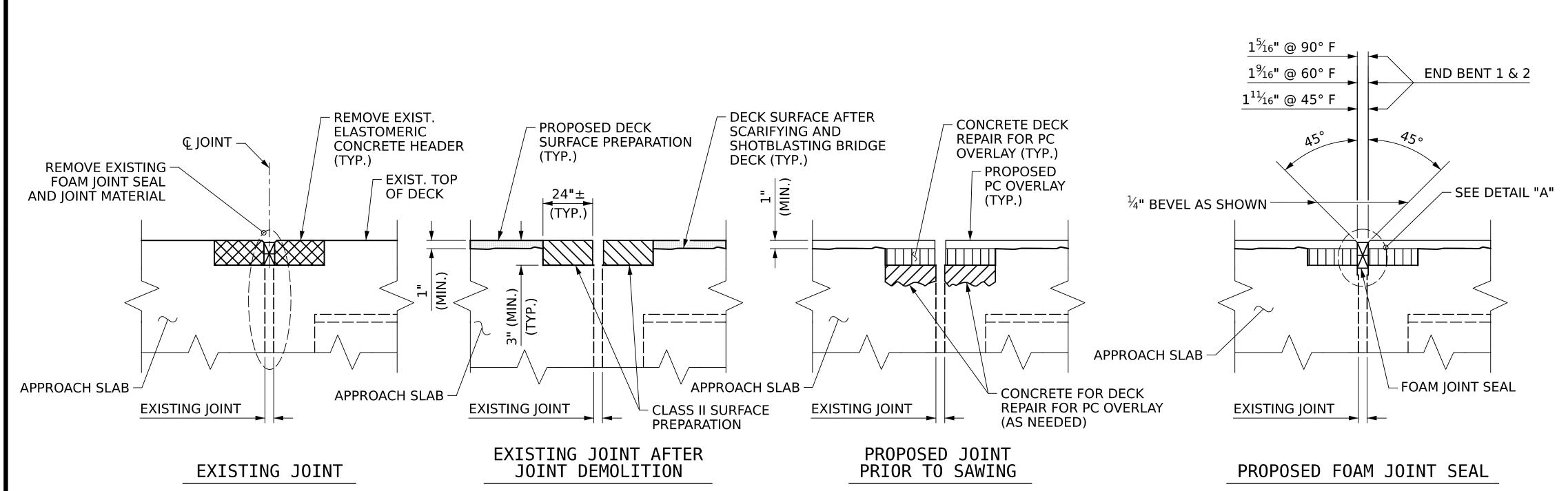
| Rienwood Avenue<br>900<br>gh,NC 27603 | DOCUMENT<br>FINAL |  |  |
|---------------------------------------|-------------------|--|--|
| 120-7660                              | SIGNATU           |  |  |

R.L.PUTEK

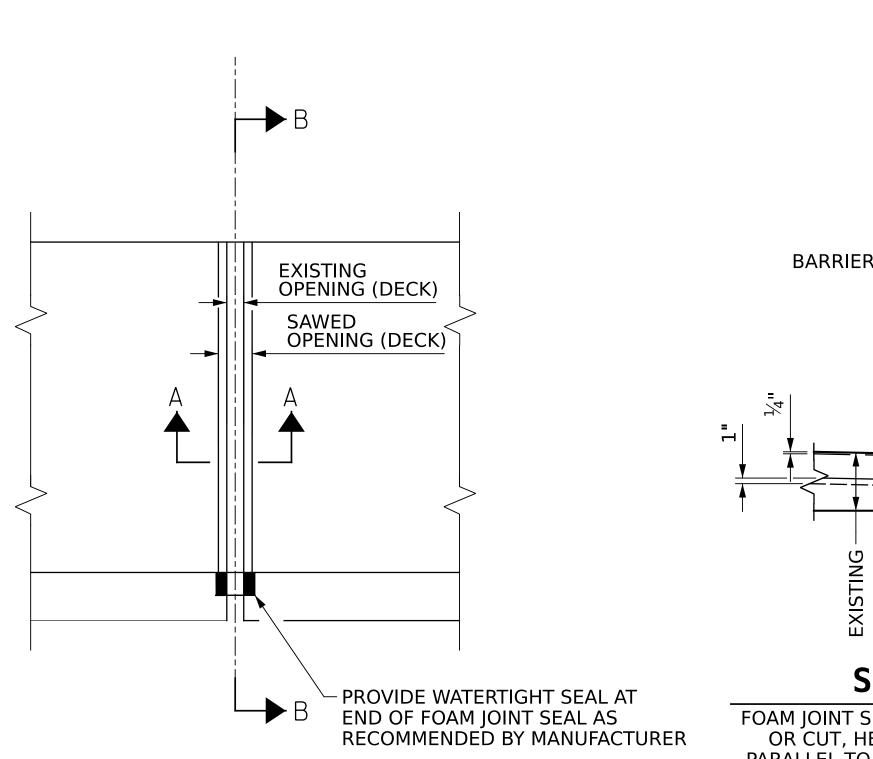
J.A.YANNACCONE

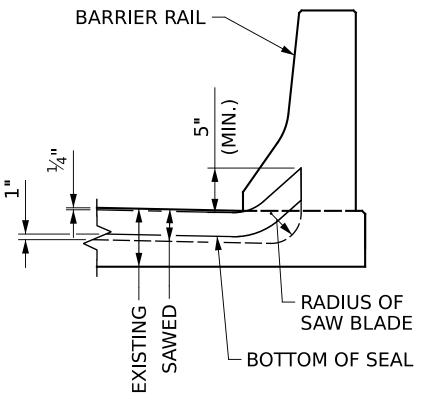
DRAWN BY :

CHECKED BY:



#### **SECTION A-A** (NOT TO SCALE)





### **SECTION B-B**

FOAM JOINT SEAL SHALL BE FACTORY FORMED OR CUT, HEAT WELDED AND TURNED UP PARALLEL TO SLOPED FACE OF BARRIER RAIL.

#### **NOTES:**

FINAL JOINT SEALS SHALL NOT BE INSTALLED UNTIL THE OVERLAY OR SEALANT WORK IS COMPLETE.

THE CONTRACTOR SHALL FIELD VERIFY THE EXISTING JOINT OPENING PRIOR TO ORDERING JOINT SEAL MATERIAL. IF THE ACTUAL JOINT OPENING VARIES FROM THE OPENING INDICATED IN THE DETAILS BY MORE THAN  $\frac{1}{4}$ ", NOTIFY THE ENGINEER.

THE MANUFACTURER IS TO PROVIDE THE NOMINAL UNCOMPRESSED SEAL WIDTH OF THE FOAM JOINT SEAL FOR THE SIZE OF THE OPENING ON THE PLANS AND ACCOMMODATE THE MINIMUM EXPANSION SHOWN ON THE PLANS.

FOAM JOINTS SHALL BE INSTALLED AS PER THE MANUFACTURER'S RECOMMENDATIONS.

THE CONTRACTOR SHALL TAKE CARE DURING JOINT REHAB OPERATIONS NOT TO DROP ANY MATERIAL BELOW THE BRIDGE WITHOUT PROTECTIVE DEVICES BELOW TO CATCH THE MATERIAL. ANY MATERIAL THAT FALLS BELOW THE BRIDGE SHALL BE CONTAINED, REMOVED AND DISPOSED OF BY THE CONTRACTOR AT NO EXTRA COST TO THE DEPARTMENT. IF THE ENGINEER DETERMINES THAT THE PROTECTIVE DEVICES ARE NOT ADEQUATE OR NOT BEING EMPLOYED, THE WORK SHALL BE SUSPENDED UNTIL ADEQUATE PROTECTION IS PROVIDED.

THE CONTRACTOR WILL NOT BE PERMITTED TO FORM THE JOINT IN LIEU OF SAWING THE JOINT.

THE INSTALLED FOAM JOINTS SHALL BE WATERTIGHT.

THE CONTRACTOR SHALL SAW CUT TO A NOMINAL DEPTH OF  $\frac{1}{2}$ " BUT REINFORCING STEEL SHALL NOT BE DAMAGED. CONTRACTOR SHALL REMOVE SURFACE CONCRETE TO VERIFY THAT SAWCUT DEPTH WILL NOT DAMAGE EXISTING REINFORCING STEEL.

FOR EXCAVATION BELOW THE BOTTOM OF PLANNED CLASS II SURFACE PREPARATION, CONCRETE FOR DECK REPAIR FOR PC OVERLAY SHALL BE PLACED IN THE EXCAVATED AREA TO THE ELEVATION AT THE BOTTOM OF THE PROPOSED PC OVERLAY.

FOR CLASS II SURFACE PREPARATION, SEE OVERLAY SURFACE PREPARATION FOR POLYMER CONCRETE SPECIAL PROVISION.

FOR CONCRETE DECK REPAIR FOR PC OVERLAY, SEE POLYMER CONCRETE BRIDGE DECK OVERLAY SPECIAL PROVISION.

FOR FOAM JOINT SEALS FOR PRESERVATION, SEE SPECIAL PROVISIONS.

ALL EXISTING ELASTOMERIC CONCRETE SHALL BE REMOVED. THE DEPTH SHOWN IN THE DETAILS FOR CLASS II SURFACE PREPARATION AT THE EXISTING JOINT IS THE MINIMUM DEPTH REQUIRED.

| AS-BUILT                          | SUMMARY    | OF QUA       | NTITIES |
|-----------------------------------|------------|--------------|---------|
| ITEM                              | LOCATION   | ESTIMATED    | ACTUAL  |
|                                   |            |              |         |
| FOAM JOINT SEALS FOR PRESERVATION | END BENT 1 | 41.0 LIN.FT. |         |
|                                   | END BENT 2 | 41.0 LIN.FT. |         |
|                                   |            |              |         |
|                                   |            |              |         |
| CONCRETE DECK                     | END BENT 1 | 17.8 SQ.YDS. |         |
| REPAIR FOR PC OVERLAY             | END BENT 2 | 17.8 SQ.YDS. |         |
|                                   |            |              |         |

DETAIL "A"

**HI-0018** PROJECT NO. **COLUMBUS** COUNTY 230053 BRIDGE NO.



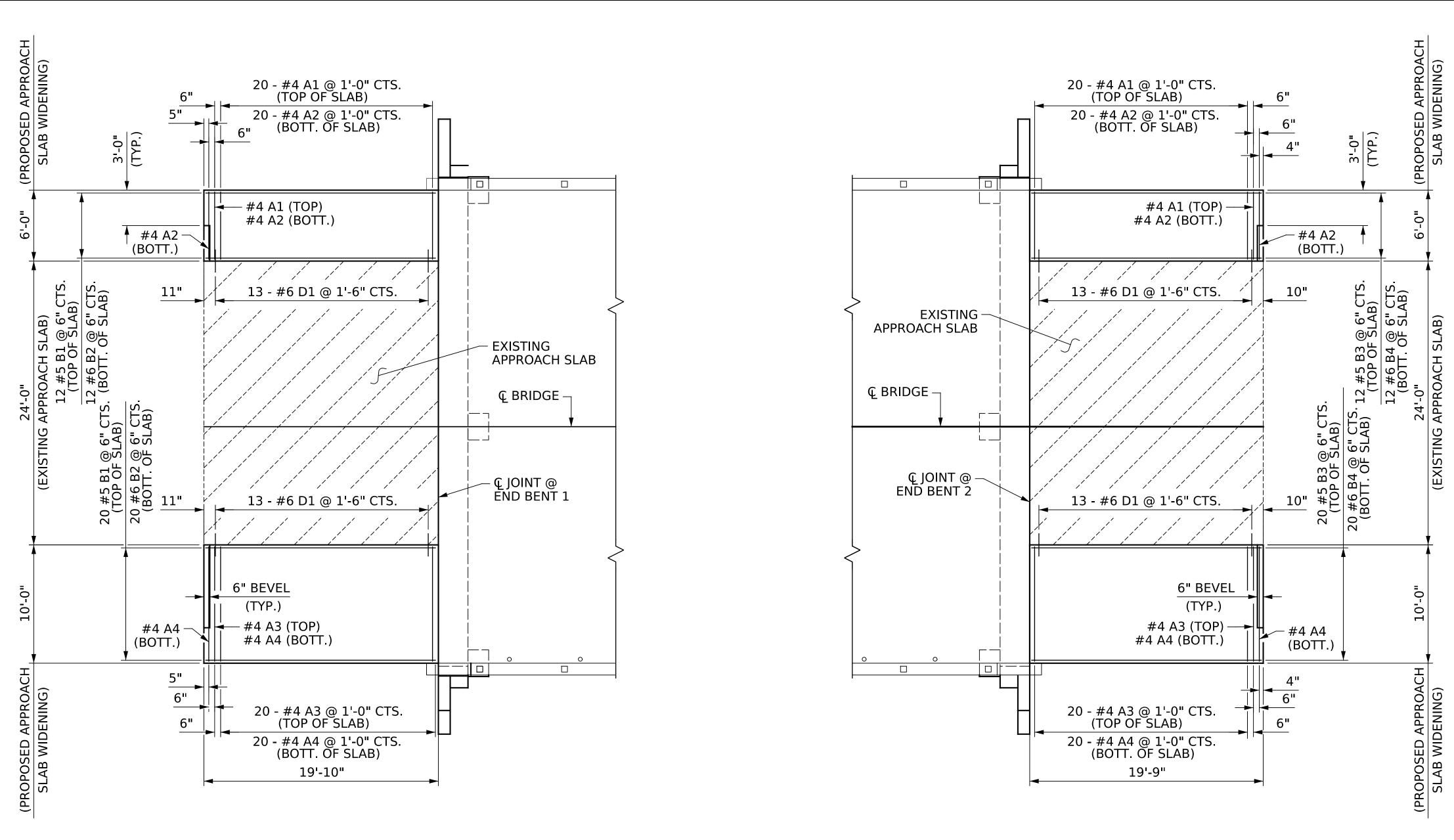
STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION RALEIGH

> FOAM JOINT SEAL **DETAILS**

**PLAN** One Glenwood Avenue Suite 900 Raleigh, NC 27603 919–420–7660 NC Lic. No. F–0270 \_ DATE : 08/2024 \_ DATE : 08/2024

|   |     |     | REVIS | SIO | NS |
|---|-----|-----|-------|-----|----|
| UMENT NOT CONSIDERED                    | NO. | BY: | DATE: | NO. | В  |
| FINAL UNLESS ALL<br>IGNATURES COMPLETED | 1   |     |       | 3   |    |
| 2011111120                              | മ   |     |       |     |    |

S1-06 DATE: TOTAL SHEETS



PLAN @ END BENT 2

#### - MATCH TOP OF SLAB WITH FINAL BRIDGE DECK ELEVATION / $3\frac{1}{4}$ " CONTINUOUS HIGH CHAIR UPPER (CHCU) @ 3'-0" CTS. ACROSS SLAB SAWED OPENING FOR - #6 D1 DOWEL PLACED /- #6 "B" JOINT SEAL MID-DEPTH OF SLAB −#5 "B" ROADWAY -(TYP.) BARS – #4 "A" SEE "FOAM JOINT DETAILS" BARS 10 #4 "A" BARS - $5\frac{1}{2}$ " B25.0C $\angle$ 2:1 SLOPE $\angle$ (SEE ROADWAY PLANS) - APPROVED WIRE BAR SUPPORTS @ 3'-0" CTS. 2 LAYERS OF 30 LB. – ROOFING FELT TO PREVENT BOND 1" FORMED OPENING

**SECTION THRU SLAB** 

PLAN @ END BENT 1

\_ DATE : 08/2024 \_ DATE : 08/2024

R.L.PUTEK

J.A.YANNACCONE

DRAWN BY :

CHECKED BY:

- SLABS PRIOR TO ORDERING REINFORCING BARS.
- 2. FOR ADHESIVELY ANCHORED DOWELS, NO FIELD TESTING IS REQUIRED.
- 3. FOR ADHESIVELY ANCHORED ANCHOR BOLTS OR DOWELS, SEE
- 4. FOR FOAM JOINT SEALS FOR PRESERVATION, SEE SPECIAL PROVISIONS.

SEAL 032492 O NGINEER

PROJECT NO. **COLUMBUS** COUNTY 230053 BRIDGE NO.

**HI-0018** 

**BILL OF MATERIAL** 

STR

SIZE

#4

#4

#4

#5

#6

#6

APPROACH SLAB AT END BENT 2

SIZE

#4

#4

#4

#4

#5

#6

#6

END BENT 1

79

83

136

142

631

933

59

1217 LBS.

846 LBS.

79

83

136

142

629

929

59

1213 LBS.

844 LBS.

9.9 CU. YDS.

10.0 CU. YDS.

TYPE | LENGTH | WEIGHT

5'-8"

5'-8"

9'-8"

9'-8"

18'-11"

19'-5"

1'-6"

TYPE | LENGTH | WEIGHT

5'-8"

5'-8"

9'-8"

9'-8"

18'-10"

19'-4"

1'-6"

APPROACH SLAB AT

NO.

21

22

21

22

32

32

26

REINFORCING STEEL

REINFORCING STEEL

CLASS AA CONCRETE

NO.

21

22

21

22

32

32

26

REINFORCING STEEL

REINFORCING STEEL

**CLASS AA CONCRETE** 

\* EPOXY COATED

\* EPOXY COATED

\*A1

\*A3

Α4

\*B1

B2

D1

BAR

\*A1

\*A3

Α4

\*B3

В4

D1

STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION

APPROACH SLAB WIDENING DETAILS

| IDERED NO | CONSI            | NOT        | OCUMENT          |
|-----------|------------------|------------|------------------|
| LETED 1   | ESS AL<br>COMPLE | UNL<br>RES | FINAL<br>SIGNATU |

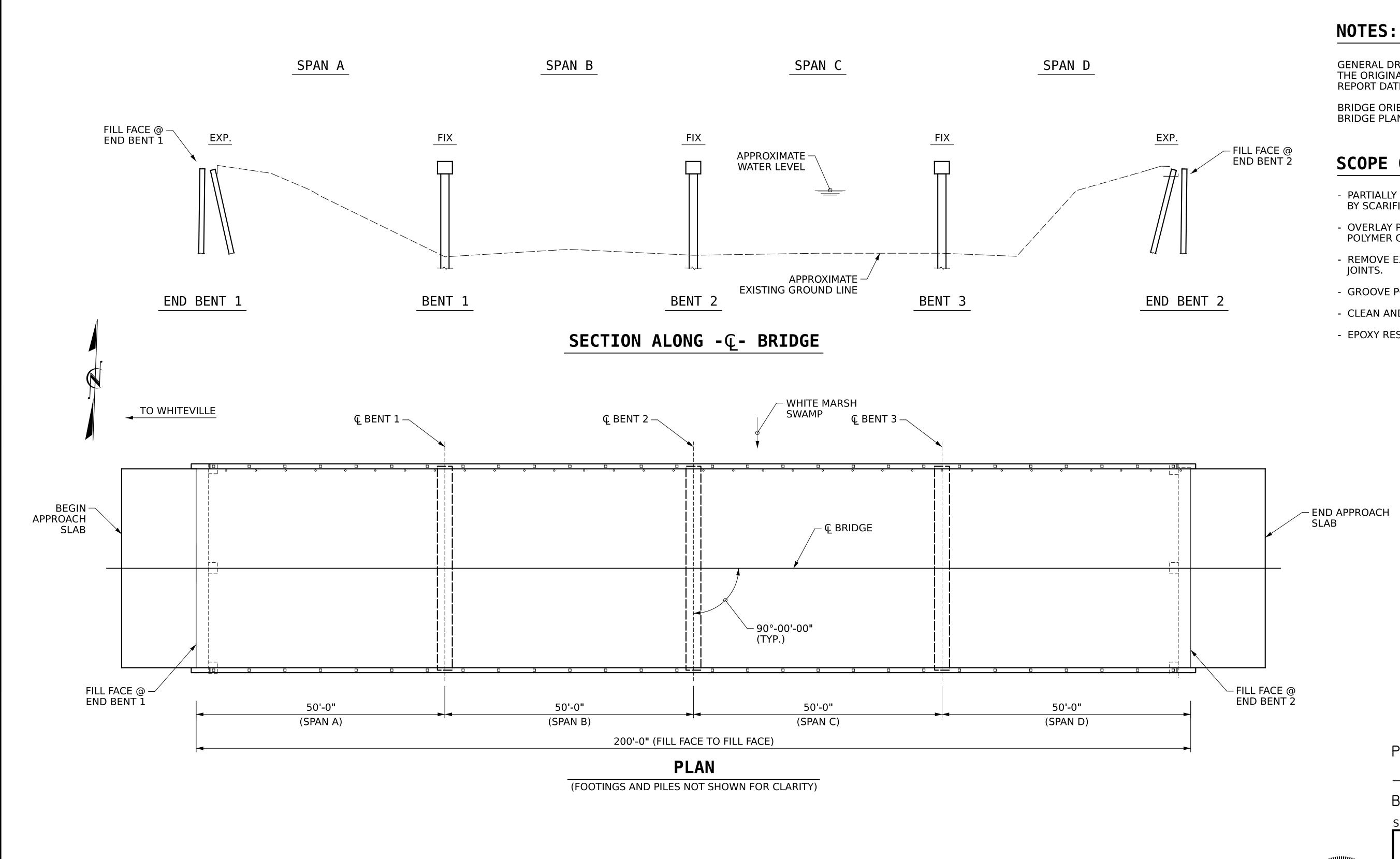
|        | SHEET NO |         |     |       |                 |
|--------|----------|---------|-----|-------|-----------------|
| D. BY: | DATE:    | NO.     | BY: | DATE: | S1-07           |
| ]      |          | <u></u> |     |       | TOTAL<br>SHEETS |
|        |          | 4       |     |       | 79              |
|        |          |         |     |       |                 |

**NOTES** 

1. THE CONTRACTOR SHALL VERIFY THE DIMENSIONS OF THE APPROACH

ARTICLE 420-13 OF THE STANDARD SPECIFICATIONS.

5. FOR APPROACH SLAB WIDENING, SEE SPECIAL PROVISIONS.



GENERAL DRAWING INFORMATION IS TAKEN FROM THE ORIGINAL PLANS AND THE ROUTINE INSPECTION REPORT DATED 06/12/2023.

BRIDGE ORIENTATION CONFORMS TO THE EXISTING BRIDGE PLANS AND ROUTINE INSPECTION REPORT.

#### SCOPE OF WORK:

- PARTIALLY REMOVE TOP OF BRIDGE DECK CONCRETE BY SCARIFICATION AND SHOTBLASTING METHODS.
- OVERLAY PREPARED TOP OF BRIDGE DECK WITH POLYMER CONCRETE (PC).
- REMOVE EXISTING JOINT MATERIAL AND INSTALL FOAM JOINTS.
- GROOVE PC BRIDGE DECK.
- CLEAN AND PAINT EXISTING STRUCTURAL STEEL BEAMS.
- EPOXY RESIN INJECTION OF CONCRETE CRACKS.

**HI-0018** PROJECT NO.\_

COLUMBUS

230054

DATE:

COUNTY

SHEET NO

S2-01

TOTAL SHEETS 79

SHEET 1 OF 2

BRIDGE NO.\_

STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION

#### GENERAL DRAWING

FOR BRIDGE ON US 74 - US 76 BYP WBL OVER WHITE MARSH SWAMP

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

REVISIONS NO. BY: DATE:

I HEREBY CERTIFY THAT THIS STRUCTURE WAS REHABILITATED ACCORDING TO THESE PLANS OR AS NOTED HEREIN.

DATE RESIDENT ENGINEER

R.L.PUTEK J.A.YANNACCONE \_ DATE : 08/2024 \_ DATE : 08/2024 DRAWN BY : CHECKED BY :