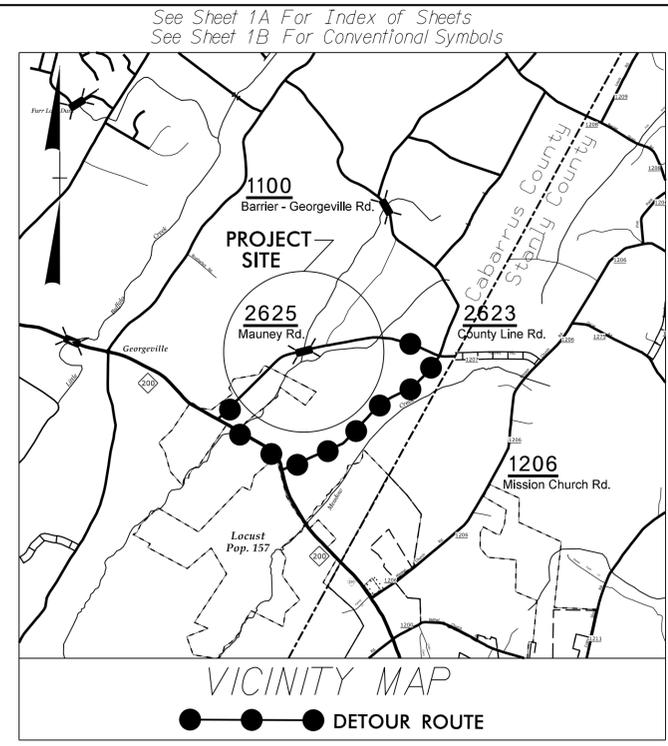


09_08/2011

29-SEP-2025 15:05
 M:\2010\221601946_08 NCDOT Div 10 LIBR\221601946_08C_17BP_10_R_108_ Bridge 292\Roadway\Proj\292_Rdy_fsh.dgn
 \$\$\$SERVERNAME\$\$\$

STATE PROJECT: BP10-R055

CONTRACT: DJ00585



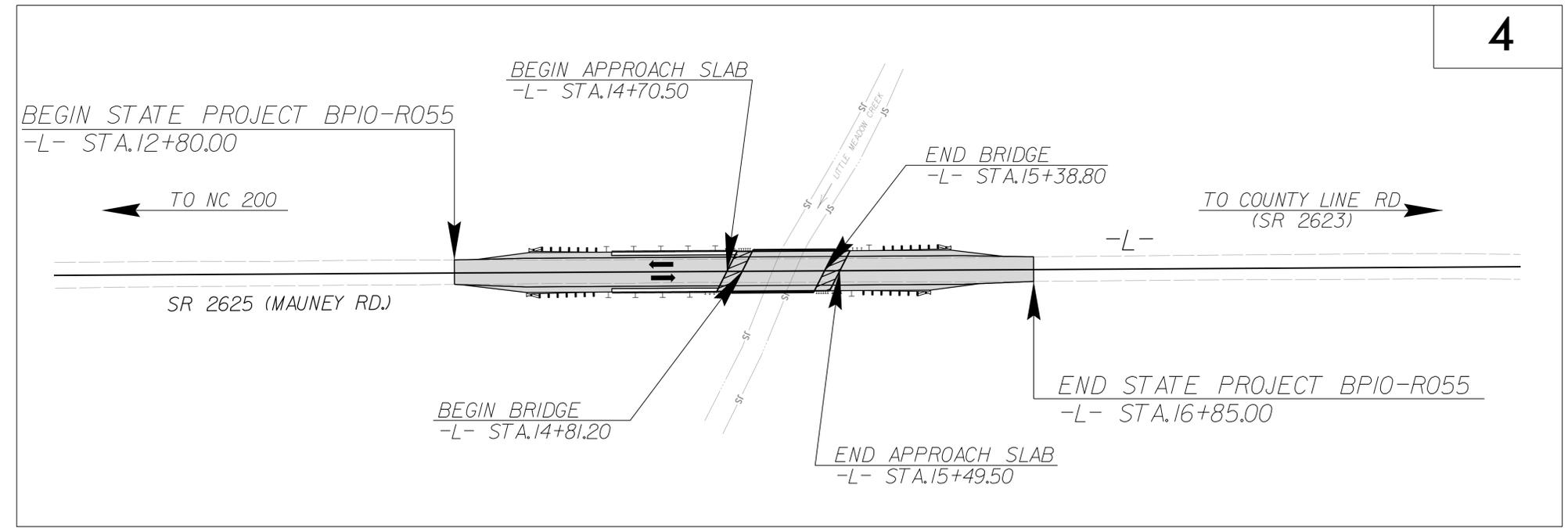
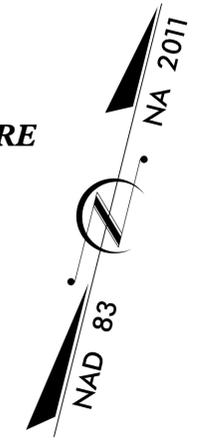
STATE OF NORTH CAROLINA
 DIVISION OF HIGHWAYS

CABARRUS COUNTY

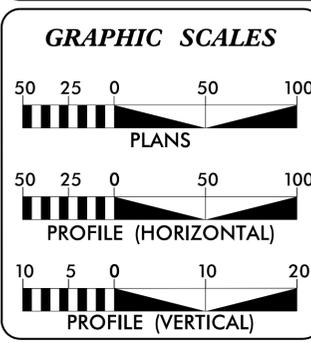
LOCATION: REPLACE BRIDGE NO. 120292 OVER LITTLE MEADOW CREEK ON SR 2625 (MAUNEY RD.)

TYPE OF WORK: GRADING, PAVING, DRAINAGE AND STRUCTURE

STATE	STATE PROJECT REFERENCE NO.	SHEET NO.	TOTAL SHEETS
N.C.	BP10-R055	1	
STATE PROJ. NO.	F.A. PROJ. NO.	DESCRIPTION	
BP10.R055.1	N/A	PE	
BP10.R055.2	N/A	RW/UTIL	
BP10.R055.3	N/A	CON	



DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED



DESIGN DATA

ADT 2025 =	150
ADT 2045 =	336
K =	N/A %
D =	N/A %
T =	N/A %
V =	55 MPH
FUNC CLASS =	LOCAL
SUB -	REGIONAL TIER

PROJECT LENGTH

LENGTH OF ROADWAY STATE PROJECT BP10-R055	=	0.066 MILES
LENGTH OF STRUCTURE STATE PROJECT BP10-R055	=	0.011 MILES
TOTAL LENGTH OF STATE PROJECT BP10-R055	=	0.077 MILES

Prepared in the Office of:

KCI Associates of N.C., P.A.
 4800 Falls of Neuse Road, Suite 200
 Raleigh, NC 27609
 Phone (919) 783-9214
 NC Firm License No: C-0764

Plans Prepared For:

NCDOT DIVISION 10
 716 W. Main St.
 Albemarle, NC 28001

2024 STANDARD SPECIFICATIONS

RIGHT OF WAY DATE:
 JUNE 6, 2022

LETTING DATE:
 DECEMBER 3, 2025

NCDOT CONTACT: YANWEI MA, P.E.
 DIVISION 10 BRIDGE PROGRAM MANAGER

ROBERT F. DECOLA, P.E.
 KCI PROJECT MANAGER

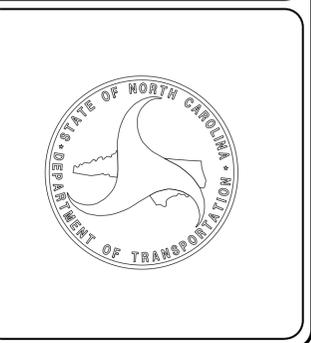
MATT G. ARMSTRONG, P.E.
 KCI ROADWAY DESIGN ENGINEER

HYDRAULICS ENGINEER

Signed by: *Josh Dalton* 10/23/2025
 1089AD8C14994C3
 SIGNATURE: P.E.

ROADWAY DESIGN ENGINEER

Signed by: *Matthew G. Armstrong* 10/23/2025
 BFFA927805A355A
 SIGNATURE: P.E.





DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

KCI Associates of N.C., P.A.
 4800 Falls of Neuse Road, Suite 200
 Raleigh, NC 27609
 Phone (919) 783-9214
 NC Firm License No. C-0764

INDEX OF SHEETS

SHEET NUMBER	SHEET
1	TITLE SHEET
1A	INDEX OF SHEETS, GENERAL NOTES, AND LIST OF STANDARD DRAWINGS
1B	CONVENTIONAL SYMBOLS
2A-1	TYPICAL SECTIONS, PAVEMENT SCHEDULE, WEDGING DETAIL, AND PROFILE KEY-IN DETAIL
2C-1	METHOD OF PIPE INSTALLATION - FLEXIBLE PIPE
2C-2	METHOD OF PIPE INSTALLATION - RIGID PIPE
2C-3	GUARDRAIL PLACEMENT
2C-4	GUARDRAIL PLACEMENT
3B-1	ROADWAY SUMMARIES
3D-1	SUMMARY OF DRAINAGE
4	PLAN SHEET
5	PROFILE SHEET
RW01 TO RW04	SURVEY CONTROL, EXISTING CENTERLINES, RIGHT OF WAY EASEMENT, AND PROPERTY TIES
TMP-1 TO TMP-4	TRANSPORTATION MANAGEMENT PLANS
PMP-1 TO PMP-2	PAVEMENT MARKING PLANS
EC-1 TO EC-5	EROSION CONTROL PLANS
U0-1 TO U0-2	UTILITIES BY OTHERS PLANS
X-1	CROSS SECTION SUMMARY SHEET
X-2 TO X-7	CROSS SECTIONS
S-1 TO SN	STRUCTURE PLANS

GENERAL NOTES: 2024 SPECIFICATIONS
 EFFECTIVE: 01-16-2024
 REVISED:

GRADE LINE:
 GRADING AND SURFACING: THE GRADE LINES SHOWN DENOTE THE FINISHED ELEVATION OF THE PROPOSED SURFACING AT GRADE POINTS SHOWN ON THE TYPICAL SECTIONS. GRADE LINES MAY BE ADJUSTED AT THEIR BEGINNING AND ENDING AND AT STRUCTURES AS DIRECTED BY THE ENGINEER IN ORDER TO SECURE A PROPER TIE-IN.

CLEARING:
 CLEARING ON THIS PROJECT SHALL BE PERFORMED TO THE LIMITS ESTABLISHED BY METHOD 11.

SUPERELEVATION:
 ALL CURVES ON THIS PROJECT SHALL BE SUPERELEVATED IN ACCORDANCE WITH STD. NO. 225.04 USING THE RATE OF SUPERELEVATION AND RUNOFF SHOWN ON THE PLANS. SUPERELEVATION IS TO BE REVOLVED ABOUT THE GRADE POINTS SHOWN ON THE TYPICAL SECTIONS.

SHOULDER CONSTRUCTION:
 ASPHALT, EARTH, AND CONCRETE SHOULDER CONSTRUCTION ON THE HIGH SIDE OF SUPERELEVATED CURVES SHALL BE IN ACCORDANCE WITH STD. NO. 560.01

TEMPORARY SHORING:
 SHORING REQUIRED FOR THE MAINTENANCE OF TRAFFIC WILL BE PAID FOR AS "EXTRA WORK" IN ACCORDANCE WITH SECTION 104-7.

GUARDRAIL:
 THE GUARDRAIL LOCATIONS SHOWN ON THE PLANS MAY BE ADJUSTED DURING CONSTRUCTION AS DIRECTED BY THE ENGINEER. THE CONTRACTOR SHOULD CONSULT WITH THE ENGINEER PRIOR TO ORDERING GUARDRAIL MATERIAL.

END BENTS:
 THE ENGINEER SHALL CHECK THE STRUCTURE END BENT PLANS, DETAILS, AND CROSS-SECTION PRIOR TO SETTING OF THE SLOPE STAKES FOR THE EMBANKMENT OR EXCAVATION APPROACHING A BRIDGE.

UTILITIES:
 UTILITY OWNERS ON THIS PROJECT ARE UNION POWER (Distribution) AND WINDSTREAM. ANY RELOCATION OF EXISTING UTILITIES WILL BE ACCOMPLISHED BY OTHERS.

RIGHT-OF-WAY MARKERS:
 ALL RIGHT-OF-WAY MARKERS ON THIS PROJECT SHALL BE PLACED BY OTHERS.

2024 ROADWAY ENGLISH STANDARD DRAWINGS EFF. 01-16-2024
 REV.

The following Roadway Standards as appear in "Roadway Standard Drawings" Contracts Standards and Development Unit - N. C. Department of Transportation - Raleigh, N. C., Dated January, 2024 are applicable to this project and by reference hereby are considered a part of these plans:

STD.NO.	TITLE
DIVISION 2 - EARTHWORK	
200.02	Method of Clearing - Method 11
225.02	Guide for Grading Subgrade - Secondary and Local
225.04	Method of Obtaining Superelevation - Two Lane Pavement
DIVISION 3 - PIPE CULVERTS	
300.01	Method of Pipe Installation (Use Details in Lieu of Standards for Sheet 1 and 2 of 2)
DIVISION 4 - MAJOR STRUCTURES	
423.01	Bridge Approach Fills - Type I Approach Fill For Bridge Abutment
DIVISION 5 - SUBGRADE, BASES AND SHOULDERS	
560.01	Method of Shoulder Construction - High Side of Superelevated Curve - Method 1
DIVISION 8 - INCIDENTALS	
840.00	Concrete Base Pad for Drainage Structures
840.25	Anchorage for Frames - Brick, Concrete or Precast
840.29	Frames and Narrow Slot Flat Grates
840.35	Traffic Bearing Grated Drop Inlet - for Double Frame and Grates
840.46	Traffic Bearing Precast Drainage Structure
846.01	Concrete Curb, Gutter and Curb & Gutter
846.04	Drop Inlet Installation in Shoulder Berm Gutter
862.01	Guardrail Placement (Use Details in Lieu of Standards for Sheet 4 and 6 of 15)
862.02	Guardrail Installation
862.03	Structure Anchor Units
866.04	Barbed Wire Fence
876.01	Rip Rap in Channels and Ditches
876.02	Guide for Rip Rap at Pipe Outlets
876.04	Drainage Ditches with Class 'B' Rip Rap

28-OCT-2025 11:31 AM \\2016-221601946-08 NCDOT Div 10 LIBR\221601946-08C-17BP-10.R.108 - Bridge 292.Roadway\Proj\292.Rdy\Index_1-A.dgn

12/2/2021

STATE OF NORTH CAROLINA, DIVISION OF HIGHWAYS CONVENTIONAL PLAN SHEET SYMBOLS

Note: Not to Scale

BOUNDARIES AND PROPERTY:

State Line	-----
County Line	-----
Township Line	-----
City Line	-----
Reservation Line	-----
Property Line	-----
Existing Iron Pin (EIP)	
Computed Property Corner	
Existing Concrete Monument (ECM)	
Parcel/Sequence Number	
Existing Fence Line	-x-x-x-
Proposed Woven Wire Fence	o-----o
Proposed Chain Link Fence	-----
Proposed Barbed Wire Fence	-----
Existing Wetland Boundary	-----
Proposed Wetland Boundary	-----
Existing Endangered Animal Boundary	-----
Existing Endangered Plant Boundary	-----
Existing Historic Property Boundary	-----

Known Contamination Area: Soil	-----
Potential Contamination Area: Soil	-----
Known Contamination Area: Water	-----
Potential Contamination Area: Water	-----
Contaminated Site: Known or Potential	

BUILDINGS AND OTHER CULTURE:

Gas Pump Vent or U/G Tank Cap	
Sign	
Well	
Small Mine	
Foundation	
Area Outline	
Cemetery	
Building	
School	
Church	
Dam	

HYDROLOGY:

Stream or Body of Water	-----
Hydro, Pool or Reservoir	
Jurisdictional Stream	-----
Buffer Zone 1	-----
Buffer Zone 2	-----
Flow Arrow	
Disappearing Stream	
Spring	
Wetland	
Proposed Lateral, Tail, Head Ditch	
False Sump	

RAILROADS:

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

RIGHT OF WAY & PROJECT CONTROL:

Primary Horiz Control Point	
Primary Horiz and Vert Control Point	
Secondary Horiz and Vert Control Point	
Vertical Benchmark	
Existing Right of Way Monument	
Proposed Right of Way Monument (Rebar and Cap)	
Proposed Right of Way Monument (Concrete)	
Existing Permanent Easement Monument	
Proposed Permanent Easement Monument (Rebar and Cap)	
Existing C/A Monument	
Proposed C/A Monument (Rebar and Cap)	
Proposed C/A Monument (Concrete)	
Existing Right of Way Line	-----
Proposed Right of Way Line	-----
Existing Control of Access Line	-----
Proposed Control of Access Line	-----
Proposed ROW and CA Line	-----
Existing Easement Line	-----
Proposed Temporary Construction Easement	-----
Proposed Temporary Drainage Easement	-----
Proposed Permanent Drainage Easement	-----
Proposed Permanent Drainage/Utility Easement	-----
Proposed Permanent Utility Easement	-----
Proposed Temporary Utility Easement	-----
Proposed Aerial Utility Easement	-----

ROADS AND RELATED FEATURES:

Existing Edge of Pavement	-----
Existing Curb	-----
Proposed Slope Stakes Cut	-----
Proposed Slope Stakes Fill	-----
Proposed Curb Ramp	
Existing Metal Guardrail	
Proposed Guardrail	
Existing Cable Guiderail	
Proposed Cable Guiderail	
Equality Symbol	
Pavement Removal	

VEGETATION:

Single Tree	
Single Shrub	
Hedge	

Woods Line	
Orchard	
Vineyard	

EXISTING STRUCTURES:

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

UTILITIES:

* SUE - Subsurface Utility Engineering
LOS - Level of Service - A, B, C or D (Accuracy)

POWER: Existing Power Pole	
Proposed Power Pole	
Existing Joint Use Pole	
Proposed Joint Use Pole	
Power Manhole	
Power Line Tower	
Power Transformer	
U/G Power Cable Hand Hole	
H-Frame Pole	
U/G Power Line Test Hole (SUE - LOS A)*	
U/G Power Line (SUE - LOS B)*	-----
U/G Power Line (SUE - LOS C)*	-----
U/G Power Line (SUE - LOS D)*	-----

TELEPHONE:

Existing Telephone Pole	
Proposed Telephone Pole	
Telephone Manhole	
Telephone Pedestal	
Telephone Cell Tower	
U/G Telephone Cable Hand Hole	
U/G Telephone Test Hole (SUE - LOS A)*	
U/G Telephone Cable (SUE - LOS B)*	-----
U/G Telephone Cable (SUE - LOS C)*	-----
U/G Telephone Cable (SUE - LOS D)*	-----
U/G Telephone Conduit (SUE - LOS B)*	-----
U/G Telephone Conduit (SUE - LOS C)*	-----
U/G Telephone Conduit (SUE - LOS D)*	-----
U/G Fiber Optics Cable (SUE - LOS B)*	-----
U/G Fiber Optics Cable (SUE - LOS C)*	-----
U/G Fiber Optics Cable (SUE - LOS D)*	-----

WATER:

Water Manhole	
Water Meter	
Water Valve	
Water Hydrant	
U/G Water Line Test Hole (SUE - LOS A)*	
U/G Water Line (SUE - LOS B)*	-----
U/G Water Line (SUE - LOS C)*	-----
U/G Water Line (SUE - LOS D)*	-----
Above Ground Water Line	-----

TV:

TV Pedestal	
TV Tower	
U/G TV Cable Hand Hole	
U/G TV Test Hole (SUE - LOS A)*	
U/G TV Cable (SUE - LOS B)*	-----
U/G TV Cable (SUE - LOS C)*	-----
U/G TV Cable (SUE - LOS D)*	-----
U/G Fiber Optic Cable (SUE - LOS B)*	-----
U/G Fiber Optic Cable (SUE - LOS C)*	-----
U/G Fiber Optic Cable (SUE - LOS D)*	-----

GAS:

Gas Valve	
Gas Meter	
U/G Gas Line Test Hole (SUE - LOS A)*	
U/G Gas Line (SUE - LOS B)*	-----
U/G Gas Line (SUE - LOS C)*	-----
U/G Gas Line (SUE - LOS D)*	-----
Above Ground Gas Line	-----

SANITARY SEWER:

Sanitary Sewer Manhole	
Sanitary Sewer Cleanout	
U/G Sanitary Sewer Line	-----
Above Ground Sanitary Sewer	-----
SS Force Main Line Test Hole (SUE - LOS A)*	
SS Force Main Line (SUE - LOS B)*	-----
SS Force Main Line (SUE - LOS C)*	-----
SS Force Main Line (SUE - LOS D)*	-----

MISCELLANEOUS:

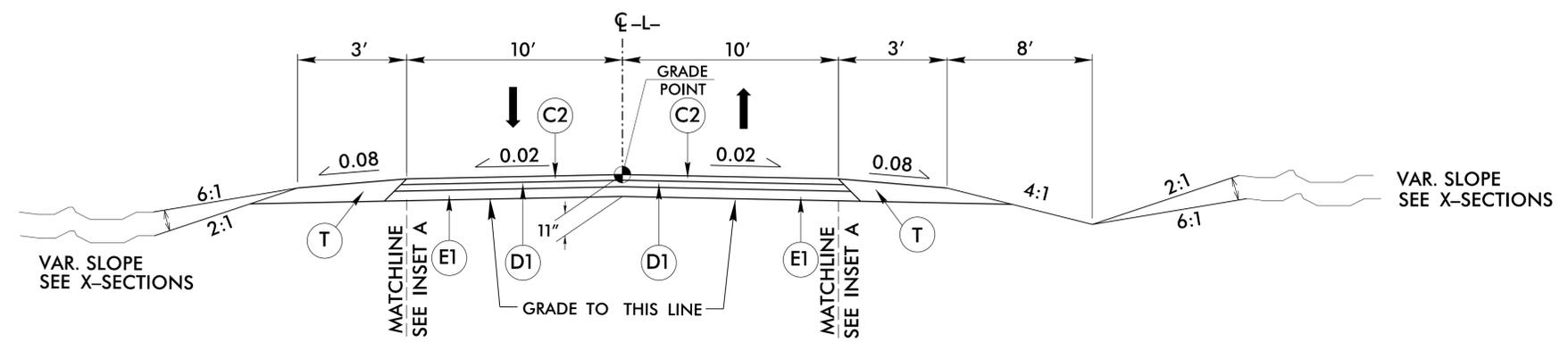
Utility Pole	
Utility Pole with Base	
Utility Located Object	
Utility Traffic Signal Box	
Utility Unknown U/G Line (SUE - LOS B)*	-----
U/G Tank; Water, Gas, Oil	
Underground Storage Tank, Approx. Loc.	
A/G Tank; Water, Gas, Oil	
Geoenvironmental Boring	
Abandoned According to Utility Records	
End of Information	

AATUR
E.O.I.

8/17/99

PAVEMENT SCHEDULE (FINAL PAVEMENT DESIGN 11/21/2024)	
C1	PROP. APPROX. 1½" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5B, AT AN AVERAGE RATE OF 165 LBS. PER SQ. YD.
C2	PROP. APPROX. 3" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5B, AT AN AVERAGE RATE OF 165 LBS. PER SQ. YD. IN EACH OF TWO LAYERS.
C3	PROP. VAR. DEPTH ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5B, AT AN AVERAGE RATE OF 110 LBS. PER SQ. YD. PER 1" DEPTH TO BE PLACED IN LAYERS NOT LESS THAN 1" IN DEPTH OR GREATER THAN 1½" IN DEPTH.
D1	PROP. APPROX. 4" ASPHALT CONCRETE INTERMEDIATE COURSE, TYPE I19.0C, AT AN AVERAGE RATE OF 456 LBS. PER SQ. YD.
E1	PROP. APPROX. 4" ASPHALT CONCRETE BASE COURSE, TYPE B25.0C, AT AN AVERAGE RATE OF 456 LBS. PER SQ. YD.
R1	SHOULDER BERM GUTTER
T	EARTH MATERIAL.
U	EXISTING PAVEMENT.
V	INCIDENTAL MILLING

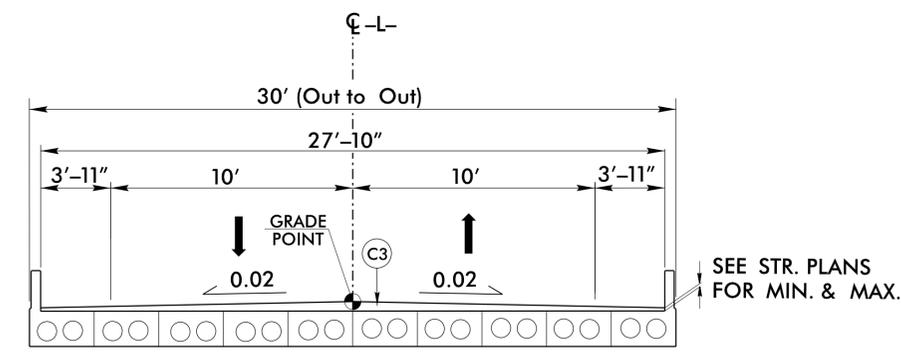
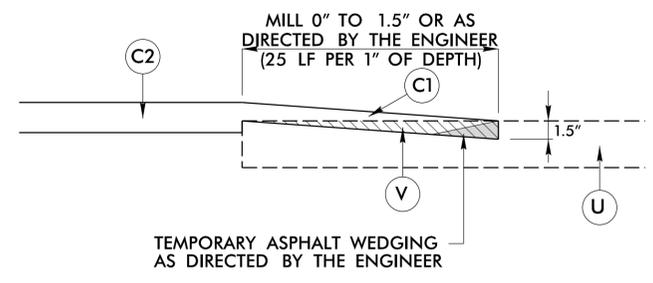
ALL PAVEMENT EDGE SLOPES ARE 1:1 UNLESS OTHERWISE SHOWN



ROADWAY TYPICAL SECTION NO. 1

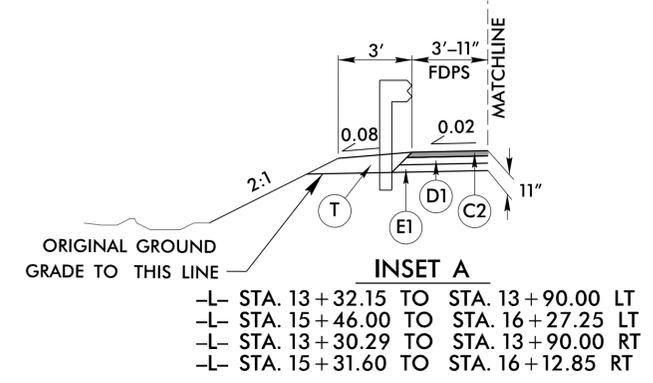
-L- STA. 12+80.00 TO STA. 14+81.20 (BEGIN BRIDGE)
-L- STA. 15+38.80 (END BRIDGE) TO STA. 16+85.00

PROFILE KEY-IN DETAIL

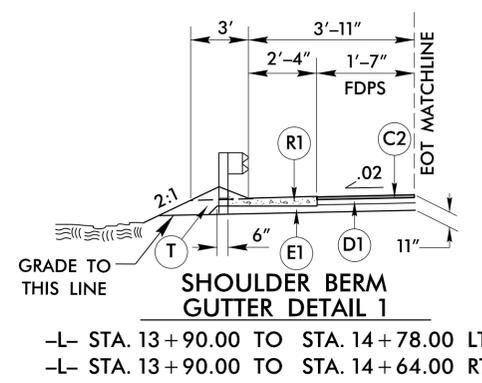


TYPICAL SECTION ON STRUCTURE

-L- STA. 14+81.20 TO STA. 15+38.80
SEE STRUCTURE PLANS FOR STRUCTURE CONSTRUCTION DETAILS



INSET A
-L- STA. 13+32.15 TO STA. 13+90.00 LT
-L- STA. 15+46.00 TO STA. 16+27.25 LT
-L- STA. 13+30.29 TO STA. 13+90.00 RT
-L- STA. 15+31.60 TO STA. 16+12.85 RT

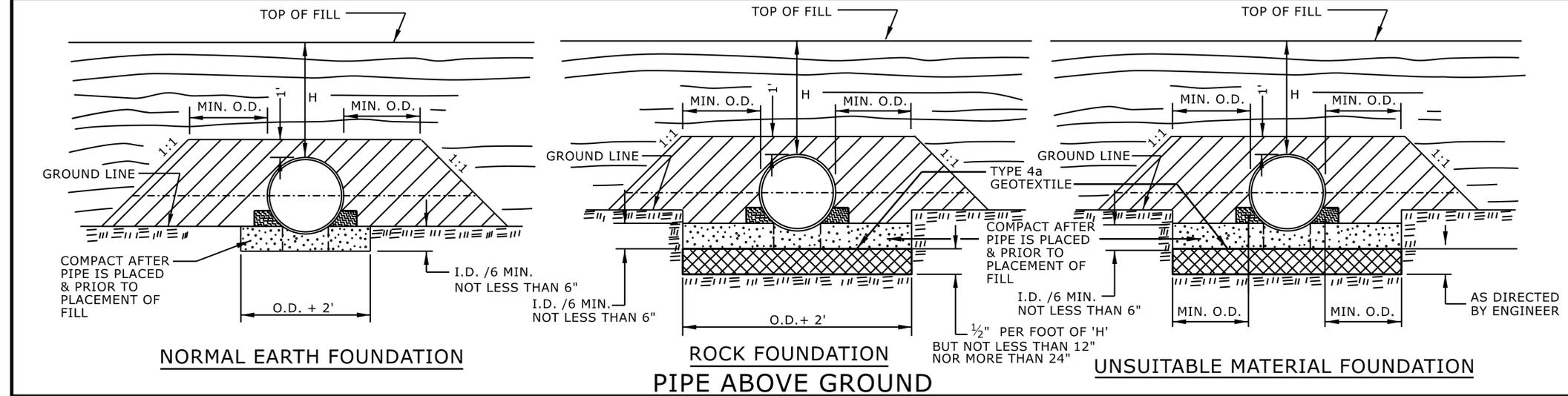
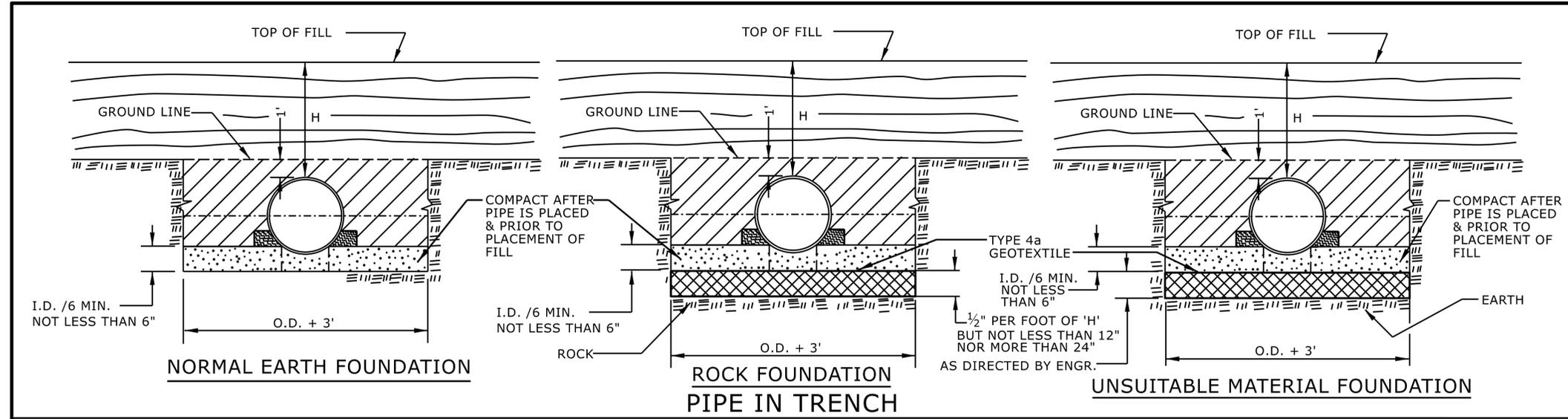


SHOULDER BERM GUTTER DETAIL 1
-L- STA. 13+90.00 TO STA. 14+78.00 LT
-L- STA. 13+90.00 TO STA. 14+64.00 RT

PROJECT REFERENCE NO. BP10-R055	SHEET NO. 2A-1
RW SHEET NO.	
ROADWAY DESIGN ENGINEER NORTH CAROLINA PROFESSIONAL SEAL 045664 10/23/2025	PAVEMENT DESIGN ENGINEER NORTH CAROLINA PROFESSIONAL SEAL 044590 10/23/2025
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED	
KCI ASSOCIATES OF N.C., P.A. 4800 Falls of Neuse Road, Suite 200 Raleigh, NC 27609-4270 Phone (919) 783-9214 NC Firm License No: C-0764	

REVISIONS

20 SEP 2025 15:05
R1 2016 16:00 146.08
R2 2016 16:00 146.08
R3 2016 16:00 146.08
R4 2016 16:00 146.08
R5 2016 16:00 146.08
R6 2016 16:00 146.08
R7 2016 16:00 146.08
R8 2016 16:00 146.08
R9 2016 16:00 146.08
R10 2016 16:00 146.08
R11 2016 16:00 146.08
R12 2016 16:00 146.08
R13 2016 16:00 146.08
R14 2016 16:00 146.08
R15 2016 16:00 146.08
R16 2016 16:00 146.08
R17 2016 16:00 146.08
R18 2016 16:00 146.08
R19 2016 16:00 146.08
R20 2016 16:00 146.08
R21 2016 16:00 146.08
R22 2016 16:00 146.08
R23 2016 16:00 146.08
R24 2016 16:00 146.08
R25 2016 16:00 146.08
R26 2016 16:00 146.08
R27 2016 16:00 146.08
R28 2016 16:00 146.08
R29 2016 16:00 146.08
R30 2016 16:00 146.08
R31 2016 16:00 146.08
R32 2016 16:00 146.08
R33 2016 16:00 146.08
R34 2016 16:00 146.08
R35 2016 16:00 146.08
R36 2016 16:00 146.08
R37 2016 16:00 146.08
R38 2016 16:00 146.08
R39 2016 16:00 146.08
R40 2016 16:00 146.08
R41 2016 16:00 146.08
R42 2016 16:00 146.08
R43 2016 16:00 146.08
R44 2016 16:00 146.08
R45 2016 16:00 146.08
R46 2016 16:00 146.08
R47 2016 16:00 146.08
R48 2016 16:00 146.08
R49 2016 16:00 146.08
R50 2016 16:00 146.08
R51 2016 16:00 146.08
R52 2016 16:00 146.08
R53 2016 16:00 146.08
R54 2016 16:00 146.08
R55 2016 16:00 146.08
R56 2016 16:00 146.08
R57 2016 16:00 146.08
R58 2016 16:00 146.08
R59 2016 16:00 146.08
R60 2016 16:00 146.08
R61 2016 16:00 146.08
R62 2016 16:00 146.08
R63 2016 16:00 146.08
R64 2016 16:00 146.08
R65 2016 16:00 146.08
R66 2016 16:00 146.08
R67 2016 16:00 146.08
R68 2016 16:00 146.08
R69 2016 16:00 146.08
R70 2016 16:00 146.08
R71 2016 16:00 146.08
R72 2016 16:00 146.08
R73 2016 16:00 146.08
R74 2016 16:00 146.08
R75 2016 16:00 146.08
R76 2016 16:00 146.08
R77 2016 16:00 146.08
R78 2016 16:00 146.08
R79 2016 16:00 146.08
R80 2016 16:00 146.08
R81 2016 16:00 146.08
R82 2016 16:00 146.08
R83 2016 16:00 146.08
R84 2016 16:00 146.08
R85 2016 16:00 146.08
R86 2016 16:00 146.08
R87 2016 16:00 146.08
R88 2016 16:00 146.08
R89 2016 16:00 146.08
R90 2016 16:00 146.08
R91 2016 16:00 146.08
R92 2016 16:00 146.08
R93 2016 16:00 146.08
R94 2016 16:00 146.08
R95 2016 16:00 146.08
R96 2016 16:00 146.08
R97 2016 16:00 146.08
R98 2016 16:00 146.08
R99 2016 16:00 146.08
R100 2016 16:00 146.08

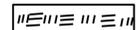


GENERAL NOTES:
 I.D. = THE MAXIMUM HORIZONTAL INSIDE DIAMETER DIMENSION.
 O.D. = THE MAXIMUM HORIZONTAL OUTSIDE DIAMETER DIMENSION.
 H = THE FILL HEIGHT MEASURED VERTICALLY AT ANY POINT ALONG THE PIPE FROM THE TOP OF THE PIPE TO THE TOP OF THE EMBANKMENT AT THAT POINT.

 APPROVED SUITABLE LOCAL MATERIAL.
 TAKE CARE TO FULLY COMPACT HAUNCH ZONE OF PIPE BACKFILL.
 LOOSELY PLACED SELECT MATERIAL CLASS III OR CLASS II, TYPE 1 FOR PIPE BEDDING. LEAVE SECTION DIRECTLY BENEATH PIPE UNCOMPACTED AS PIPE SEATING AND BACKFILL WILL ACCOMPLISH COMPACTION.

DO NOT OPERATE HEAVY EQUIPMENT OVER ANY PIPE CULVERT UNTIL THE PIPE CULVERT HAS BEEN PROPERLY BACKFILLED AND COVERED WITH AT LEAST 3 FEET OF APPROVED MATERIAL.

REFER TO NCDOT PIPE MATERIAL SELECTION GUIDE AND STANDARD SPECIFICATIONS FOR ALLOWABLE PIPE FILL HEIGHTS AND PIPE SPECIFICATIONS.

 SPRINGLINE OF PIPE
 SELECT BACKFILL MATERIAL CLASS III OR CLASS II, TYPE 1 ABOVE AND BELOW SPRINGLINE.
 UNDISTURBED EARTH MATERIAL
 SELECT MATERIAL CLASS V OR VI FOR FOUNDATION CONDITIONING. ENCAPSULATE WITH TYPE IV GEOTEXTILE AS DIRECTED BY THE ENGINEER.

STATE OF NORTH CAROLINA
 DEPT. OF TRANSPORTATION
 DIVISION OF HIGHWAYS
 RALEIGH, N.C.

ROADWAY DETAIL DRAWING FOR
METHOD OF PIPE INSTALLATION
 FLEXIBLE PIPE

SHEET 1 OF 2
300.01

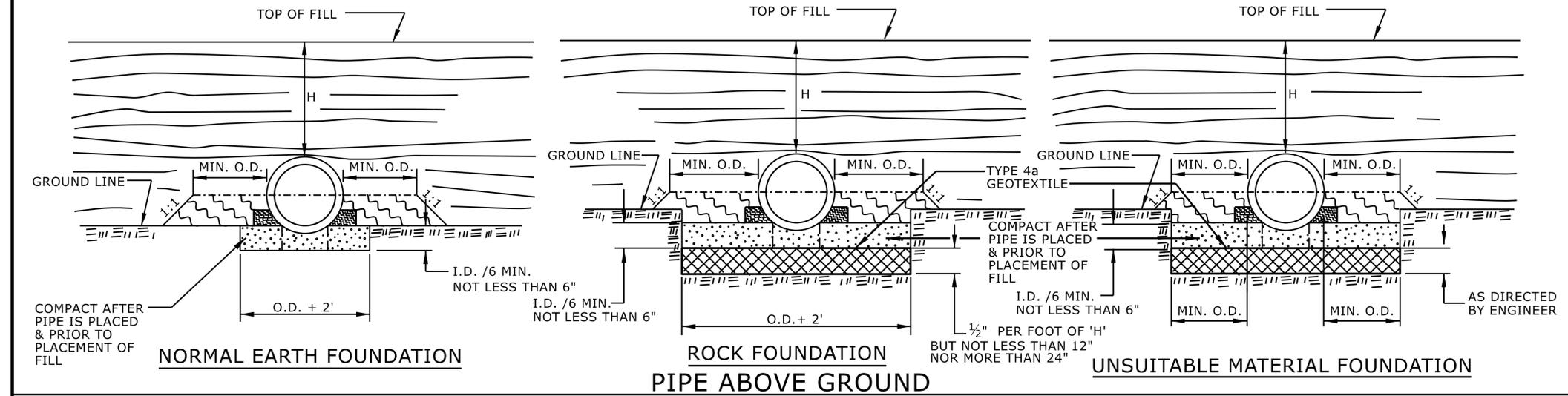
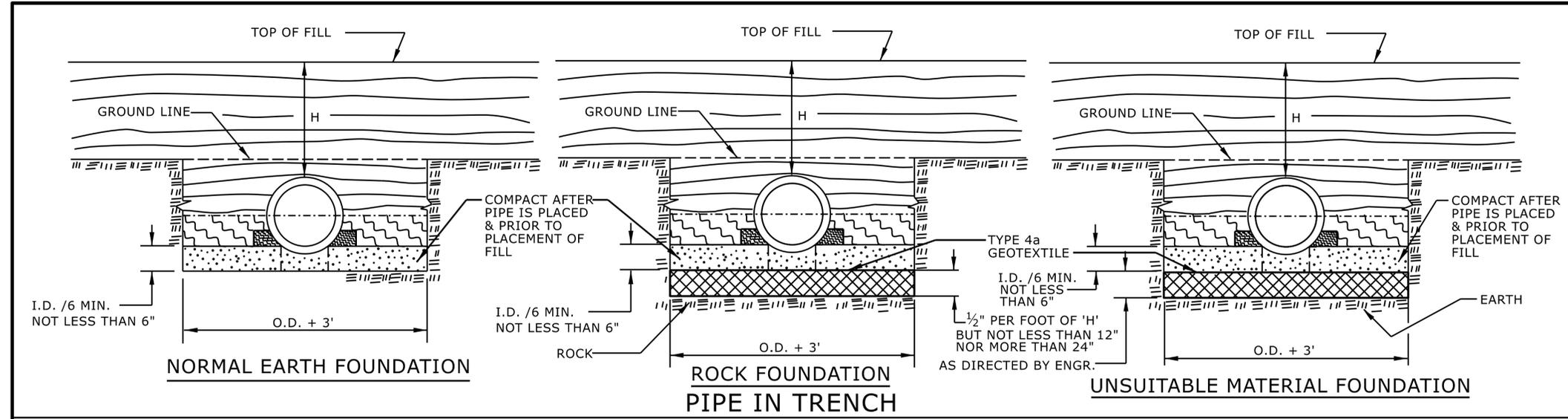


DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED

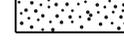
CONTRACTS STANDARDS AND DEVELOPMENT UNIT
 Office 919-707-6950 FAX 919-250-4119

SEE TITLE BLOCK

ORIGINAL BY: S.CALHOUN DATE: 7-25-2024
 MODIFIED BY: _____ DATE: _____
 CHECKED BY: _____ DATE: _____
 FILE SPEC.: _____



GENERAL NOTES:
 I.D. = THE MAXIMUM HORIZONTAL INSIDE DIAMETER DIMENSION.
 O.D. = THE MAXIMUM HORIZONTAL OUTSIDE DIAMETER DIMENSION.
 H = THE FILL HEIGHT MEASURED VERTICALLY AT ANY POINT ALONG THE PIPE FROM THE TOP OF THE PIPE TO THE TOP OF THE EMBANKMENT AT THAT POINT.

-  APPROVED SUITABLE LOCAL MATERIAL.
-  TAKE CARE TO FULLY COMPACT HAUNCH ZONE OF PIPE BACKFILL.
-  LOOSELY PLACED SELECT MATERIAL CLASS III OR CLASS II, TYPE 1 FOR PIPE BEDDING. LEAVE SECTION DIRECTLY BENEATH PIPE UNCOMPACTED AS PIPE SEATING AND BACKFILL WILL ACCOMPLISH COMPACTION.

DO NOT OPERATE HEAVY EQUIPMENT OVER ANY PIPE CULVERT UNTIL THE PIPE CULVERT HAS BEEN PROPERLY BACKFILLED AND COVERED WITH AT LEAST 3 FEET OF APPROVED MATERIAL.

REFER TO NCDOT PIPE MATERIAL SELECTION GUIDE AND STANDARD SPECIFICATIONS FOR ALLOWABLE PIPE FILL HEIGHTS AND PIPE SPECIFICATIONS.

-  SPRINGLINE OF PIPE
-  SELECT BACKFILL MATERIAL CLASS III OR CLASS II, BELOW SPRINGLINE.
-  UNDISTURBED EARTH MATERIAL
-  SELECT MATERIAL CLASS V OR VI FOR FOUNDATION CONDITIONING. ENCAPSULATE WITH TYPE IV GEOTEXTILE AS DIRECTED BY THE ENGINEER.

STATE OF
 NORTH CAROLINA
 DEPT. OF TRANSPORTATION
 DIVISION OF HIGHWAYS
 RALEIGH, N.C.

ROADWAY DETAIL DRAWING FOR
METHOD OF PIPE INSTALLATION
 RIGID PIPE

SHEET 2 OF 2
300.01

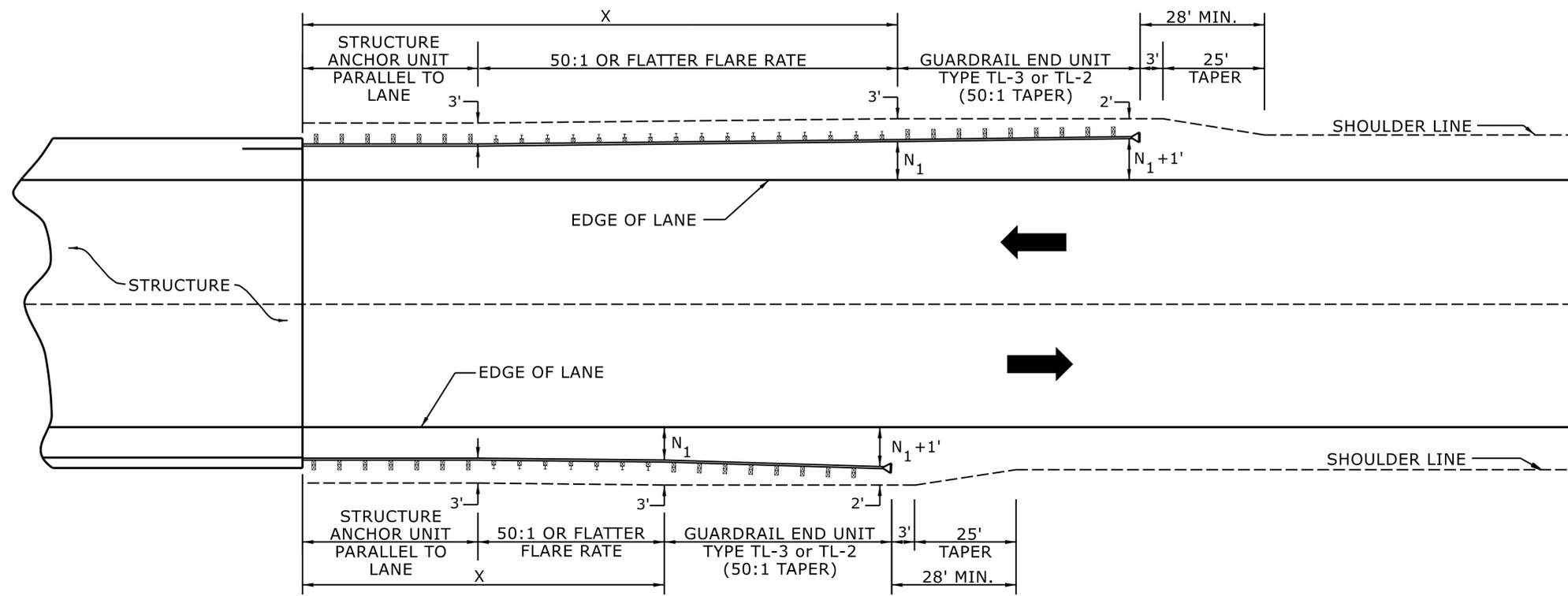


DOCUMENT NOT CONSIDERED FINAL
 UNLESS ALL SIGNATURES COMPLETED

**CONTRACTS STANDARDS
 AND DEVELOPMENT UNIT**
 Office 919-707-6950 FAX 919-250-4119

SEE TITLE BLOCK

ORIGINAL BY: S.CALHOUN DATE: 7-25-2024
 MODIFIED BY: DATE:
 CHECKED BY: DATE:
 FILE SPEC.: DATE:



USE FLARE RATE AS THE CONTROL IF THE " N_1 " DISTANCE IS NOT OBTAINED.
 (" N_1 " IS BASED ON SHOULDER WIDTHS IN THE ROADWAY DESIGN MANUAL)
 SEE STD. 862.03 FOR STRUCTURE ANCHOR UNITS
 FOR POSTED SPEEDS \geq 45MPH USE GREU TYPE TL-3
 FOR POSTED SPEEDS $<$ 45MPH USE GREU TYPE TL-2
 GUARDRAIL LENGTH OF NEED (X) IS CALCULATED BASED ON THE AASHTO ROADSIDE DESIGN GUIDE.

LENGTHS AND OFFSETS FOR PROPOSED GUARDRAIL AT TWO LANE - TWO WAY LOCATIONS

STATE OF
 NORTH CAROLINA
 DEPT. OF TRANSPORTATION
 DIVISION OF HIGHWAYS
 RALEIGH, N.C.

ROADWAY DETAIL DRAWING FOR
GUARDRAIL PLACEMENT



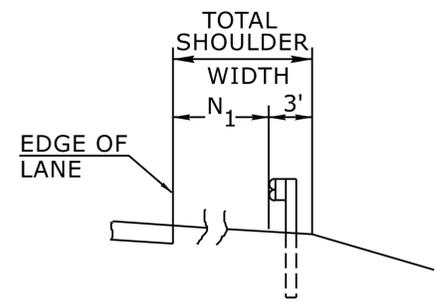
SHEET 4 OF 15
862D01

DOCUMENT NOT CONSIDERED FINAL
 UNLESS ALL SIGNATURES COMPLETED

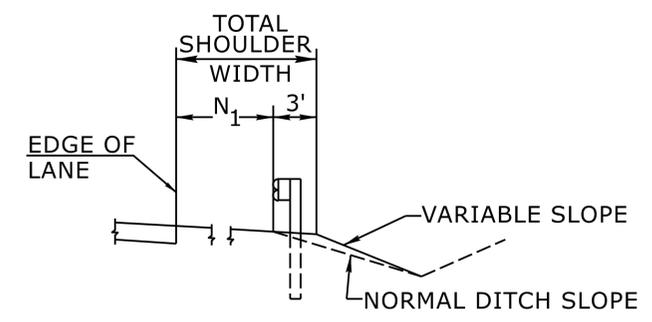
**CONTRACTS STANDARDS
 AND DEVELOPMENT UNIT**
 Office 919-707-6950 FAX 919-250-4119

SEE TITLE BLOCK

ORIGINAL BY: S.CALHOUN DATE: 7-25-2024
 MODIFIED BY: _____ DATE: _____
 CHECKED BY: _____ DATE: _____
 FILE SPEC.: _____

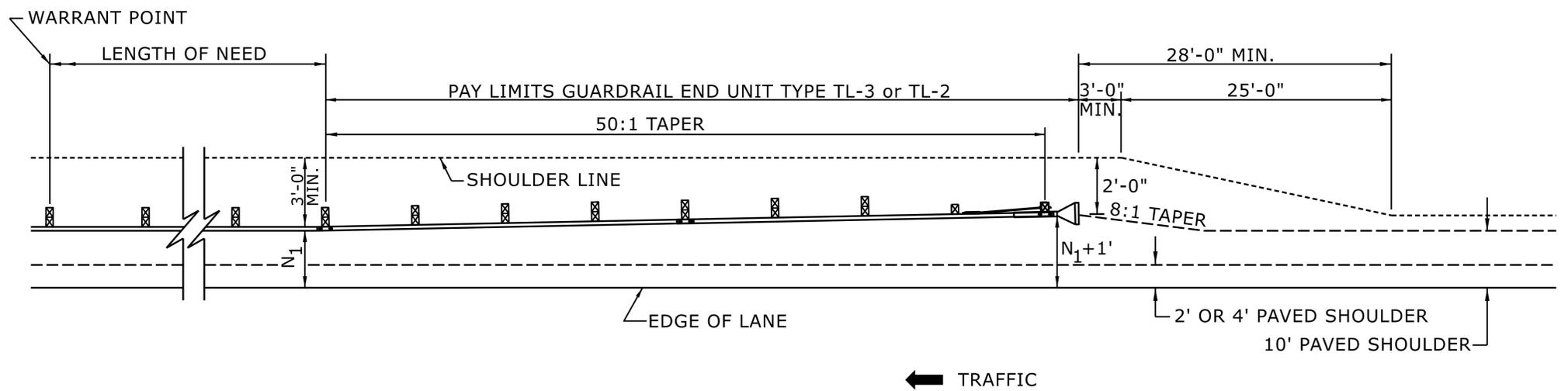


FILL SECTION



CUT SECTION

"N₁" = DISTANCE FROM EDGE OF LANE TO FACE OF GUARDRAIL WHERE GUARDRAIL IS PARALLEL TO LANE.



FOR POSTED SPEEDS ≥ 45mph USE GREU TYPE TL-3
FOR POSTED SPEEDS < 45mph USE GREU TYPE TL-2

DETAIL OF BEGINNING OF GUARDRAIL IN CUT OR FILL SECTION

STATE OF
NORTH CAROLINA
DEPT. OF TRANSPORTATION
DIVISION OF HIGHWAYS
RALEIGH, N.C.

ROADWAY DETAIL DRAWING FOR
GUARDRAIL PLACEMENT



SHEET 6 OF 15
862D01

DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED

**CONTRACTS STANDARDS
AND DEVELOPMENT UNIT**
Office 919-707-6950 FAX 919-250-4119

SEE TITLE BLOCK

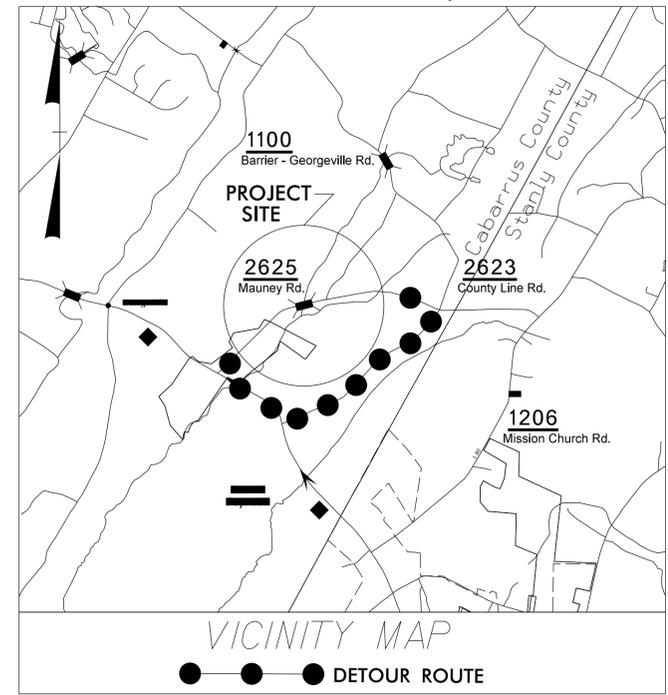
ORIGINAL BY: S.CALHOUN	DATE: 7-25-2024
MODIFIED BY:	DATE:
CHECKED BY:	DATE:
FILE SPEC.:	

STATE	STATE PROJECT REFERENCE NO.	SHEET NO.	TOTAL SHEETS
N.C.	BP10-R055	RW01	5

10/31/19

TIP PROJECT: BP10-R055

See Sheet 1-A For Index of Sheets
See Sheet 1-B For Conventional Symbols



STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

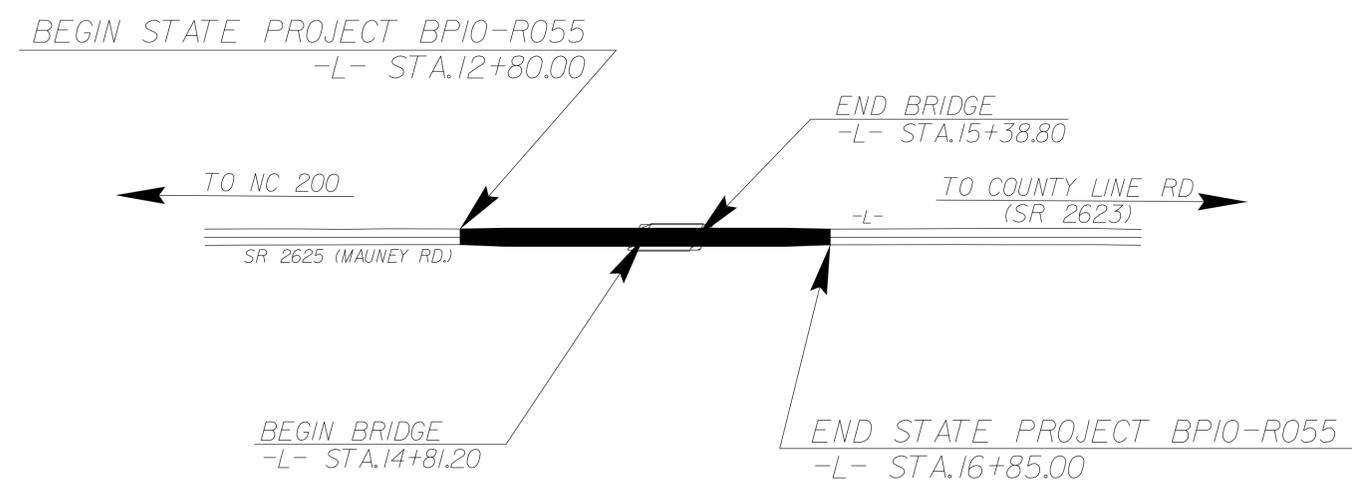
SURVEY CONTROL, EXISTING CENTERLINES,
RIGHT OF WAY, EASEMENTS AND PROPERTY TIES

CABARRUS COUNTY

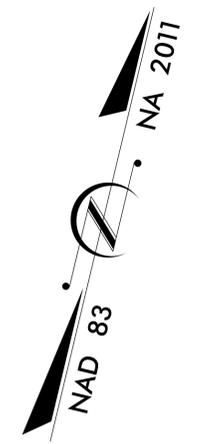
**LOCATION: REPLACE BRIDGE NO. 120292 OVER LITTLE
MEADOW CREEK ON SR 2625 (MAUNEY RD.)**

TYPE OF WORK: GRADING, PAVING, DRAINAGE AND STRUCTURE

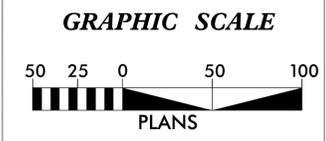
RW04



DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED



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



DATUM DESCRIPTION

THE LOCALIZED COORDINATE SYSTEM DEVELOPED FOR THIS PROJECT IS BASED ON THE STATE PLANE COORDINATES ESTABLISHED BY STEWART, INC. FOR MONUMENT "120292-2" WITH NAD 83/NA 2011 STATE PLANE GRID COORDINATES OF NORTHING: 571,991.081(ft) EASTING: 1,570,304.662(ft) ELEVATION: N/A(ft)

THE AVERAGE COMBINED GRID FACTOR USED ON THIS PROJECT (GROUND TO GRID) IS: 0.99984456

THE N.C. LAMBERT GRID BEARING AND LOCALIZED HORIZONTAL GROUND DISTANCE FROM "120292-2" TO -L- STATION 10+00.00 IS N 68°11'52.8" E 346.44(ft)

ALL LINEAR DIMENSIONS ARE LOCALIZED HORIZONTAL DISTANCES
VERTICAL DATUM USED IS NAVD 88

Prepared in the Office of:

**LOCATION & SURVEYS
DIVISION 10**

2024 STANDARD SPECIFICATIONS

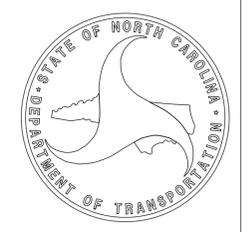
RIGHT OF WAY DATE: JUNE 6, 2022	LETTING DATE: DECEMBER 3, 2025
---	--

Not a Certified Document as to the Original Document but only as to the revisions. This document originally issued and sealed by James M. Pearsall, L-4650 on October 31, 2019.
REVISED: Date of standard specifications; property ownership; right of way date; LET date; project number.

**PROFESSIONAL LAND
SURVEYOR**

Sealed by: *James M. Pearsall*
10/16/2025

SIGNATURE: _____ Date: _____



16-OCT-2025 14:11 C:\NCDOT_V8_CONF\GIS\Projects\BP10-R055\dgn\251016_RW sheets rev\120292.ls_rw01.dgn pascruggs AT DIV10-345634L

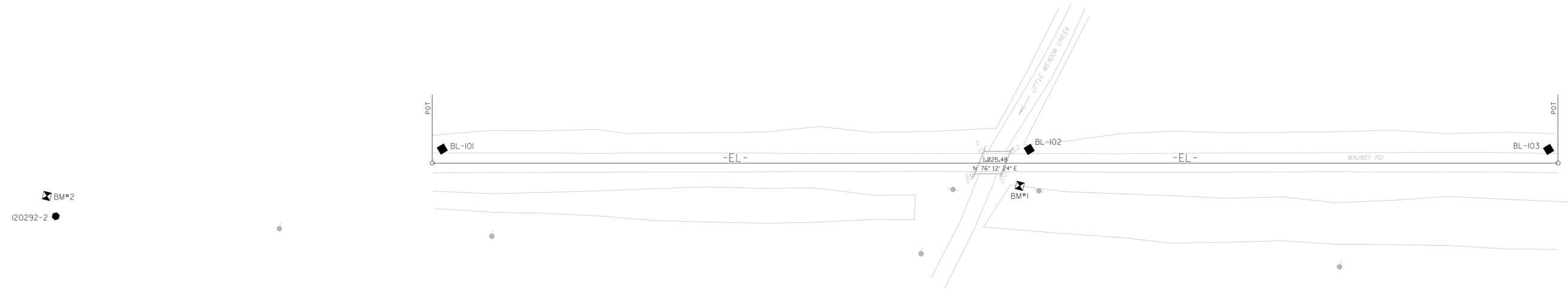
SURVEY CONTROL SHEET

W/ EXISTING CENTERLINE ALIGNMENTS PRIOR TO CONSTRUCTION

BL	POINT	DESC.	NORTH	EAST	ELEVATION
101	BL-101		572134.2520	1570632.0650	593.70
102	BL-102		572261.4200	1571151.3670	583.32
103	BL-103		572374.2020	1571610.8680	604.24

.....
 BM1 ELEVATION = 583.98
 N 572227 E 1571151
 BENCHTIE MARKER IN 10" MAPLE

.....
 BM2 ELEVATION = 601.49
 N 572007 E 1570292
 BENCHTIE MARKER IN 15" PINE



REVISIONS

I6-QCT-2025.1414
 C:\NC\007-Va_CONF\IGN\Fr-9\sects\BP10.R055.dgn\251016.RW sheets rev\120292.1s-rw02c.dgn
 pascruggs AT DIV10-345634L

EL	POINT	N	E	BEARING	DIST
POT		572119.750	1570626.324		
LINE				N 76° 12' 23.7" E	1025.48
POT		572364.247	1571622.233		

NOTES:

- PROJECT CONTROL WAS ESTABLISHED USING GNSS, THE GLOBAL NAVIGATION SATELLITE SYSTEM.
- THE SURVEY CONTROL DATA FOR THIS PROJECT HAS BEEN COMPILED FROM VARIOUS SOURCES. IF FURTHER INFORMATION REGARDING PROJECT CONTROL IS NEEDED, PLEASE CONTACT THE LOCATION AND SURVEYS UNIT.

PROPOSED ALIGNMENT CONTROL SHEET

10/31/19

REVISIONS

L			
TYPE	STATION	NORTH	EAST
POT	10+00.00	572119.7496	1570626.3237
POT	20+25.48	572364.2469	1571622.2330

NOTES:

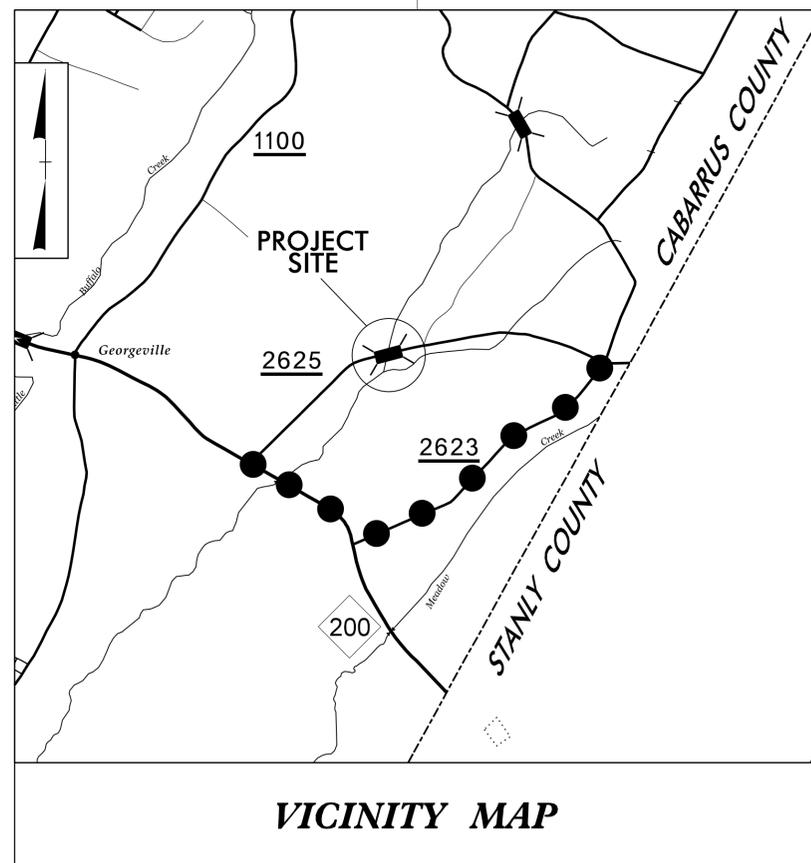
1. PROJECT CONTROL WAS ESTABLISHED USING GNSS, THE GLOBAL NAVIGATION SATELLITE SYSTEM.
2. THE PROPOSED ALIGNMENT CONTROL DATA FOR THIS PROJECT HAS BEEN COMPILED FROM VARIOUS SOURCES. IF FURTHER INFORMATINO REGARDING PROJECT CONTROL IS NEEDED, PLEASE CONTACT THE LOCATION AND SURVEYS UNIT.

I:\OCT-2025\1416
 I:\OCT-2025\1416\06_CADD\FIG\Projects\BP10-R055\dwg\251016_RW_sheets_rev\120292_1s.rw02.dgn
 passerjuggs AT DIV10-345634L

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

TRANSPORTATION MANAGEMENT PLAN

CABARRUS COUNTY



●—●—● OFFSITE DETOUR ROUTE

<u>INDEX OF SHEETS</u>	
<u>SHEET NO.</u>	<u>TITLE</u>
TMP-1	TITLE SHEET, VICINITY MAP, AND INDEX OF SHEETS
TMP-1A	LIST OF APPLICABLE ROADWAY STANDARD DRAWINGS AND LEGEND
TMP-1B	TRANSPORTATION OPERATIONS PLAN: (MANAGEMENT STRATEGIES, GENERAL NOTES, LOCAL NOTES, AND TEMPORARY TRAFFIC CONTROL PHASING)
TMP-2	SPECIAL SIGN DESIGN
TMP-3	OFFSITE DETOUR
TMP-4	OFFSITE DETOUR (INSET A)

SHEET NO.
TMP-1

DJ00585

TIP PROJECT: BP10-R055

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**

APPROVED: _____

DATE: _____

SEAL



10/23/2025

KCI KCI ASSOCIATES OF N.C., P.A.
4800 Falls of Neuse Road, Suite 200
Raleigh, NC 27609
Phone (919) 783-9214
NC Firm License No: C-0764



NGDOT CONTACTS:

ZACHARY CLARK, P.E.
PROJECT ENGINEER

SHEENA GREEN, P.E.
PROJECT DESIGN ENGINEER

PLANS PREPARED BY:

ROBERT F. DECOLA, P.E.
KCI PROJECT MANAGER

MATTHEW G. ARMSTRONG, P.E.
KCI DESIGN ENGINEER



29-SEP-2025 15:45
M:\2016\221601946.08 NCDOT Div 10 LIBR\221601946.08C_17BP_10_R108_Bridge 292\TrafficControl\TCP\Bridg_292_TC_TMP_01.dgn
\$\$\$\$\$USERNAME\$\$\$\$\$

ROADWAY STANDARD DRAWINGS

THE FOLLOWING ROADWAY STANDARDS AS APPEAR IN "ROADWAY STANDARD DRAWINGS" - N.C. DEPARTMENT OF TRANSPORTATION - RALEIGH, N.C., DATED JANUARY 2024 ARE APPLICABLE TO THIS PROJECT AND BY REFERENCE HEREBY ARE CONSIDERED A PART OF THESE PLANS:

STD. NO.	TITLE
1101.01	WORK ZONE WARNING SIGNS
1101.03	TEMPORARY ROAD CLOSURES
1101.11	TRAFFIC CONTROL DESIGN TABLES
1110.01	STATIONARY WORK ZONE SIGNS
1145.01	BARRICADES

LEGEND

GENERAL

- DIRECTION OF TRAFFIC FLOW
- DIRECTION OF PEDESTRIAN TRAFFIC FLOW
- EXIST. PVMT.
- NORTH ARROW
- PROPOSED PVMT.
- TEMP. SHORING (LOCATION PURPOSES ONLY)
- WORK AREA
- REMOVAL

SIGNALS

- EXISTING
- PROPOSED
- TEMPORARY

PAVEMENT MARKINGS

- EXISTING LINES
- TEMPORARY LINES

TRAFFIC CONTROL DEVICES

- BARRICADE (TYPE III)
- CONE
- DRUM
- SKINNY DRUM
- TUBULAR MARKER
- TEMPORARY CRASH CUSHION
- FLASHING ARROW BOARD
- FLAGGER
- LAW ENFORCEMENT
- TRUCK MOUNTED ATTENUATOR (TMA)
- CHANGEABLE MESSAGE SIGN

TEMPORARY SIGNING

- PORTABLE SIGN
- STATIONARY SIGN
- STATIONARY OR PORTABLE SIGN

PAVEMENT MARKERS

- CRYSTAL/CRYSTAL
- CRYSTAL/RED
- YELLOW/YELLOW

PAVEMENT MARKING SYMBOLS

- PAVEMENT MARKING SYMBOLS

29-SEP-2025 15:45
M:\2016\221601946.08 NCDOT Div 10 LIBR\221601946.08C_17BP.10.R.108_Bridge 292\TrafficControl\TCP\Bridg.292_TC_TMP_01A.dgn
\$\$\$\$\$USERNAME\$\$\$\$\$

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



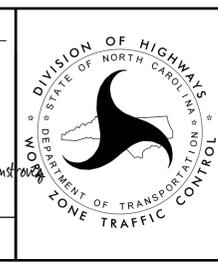
KCI ASSOCIATES OF N.C., P.A.
4800 Falls of Neuse Road, Suite 200
Raleigh, NC 27609-6270
Phone (919) 783-9214
NC Firm License No: C-0764

APPROVED: _____
DATE: _____

SEAL



**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



ROADWAY STANDARD
DRAWINGS & LEGEND

PROJ. REFERENCE NO.	SHEET NO.
BP10-R055	TMP-1B

MANAGEMENT STRATEGIES

THE FOLLOWING LISTED WORK ZONE STRATEGIES ARE RECOMMENDED FOR INCLUSION WITHIN THIS TRANSPORTATION MANAGEMENT PLAN (TMP).

- RECOMMENDED STRATEGIES:
- FULL ROADWAY CLOSURES
 - OFF-SITE DETOURS / USE OF ALTERNATIVE ROUTES

GENERAL NOTES

CHANGES MAY BE REQUIRED WHEN PHYSICAL DIMENSIONS IN THE DETAIL DRAWINGS, STANDARD DETAILS, AND ROADWAY DETAILS ARE NOT ATTAINABLE TO MEET FIELD CONDITIONS OR RESULT IN DUPLICATE OR UNDESIRABLE OVERLAPPING OF DEVICES. MODIFICATION MAY INCLUDE: MOVING, SUPPLEMENTING, COVERING, OR REMOVAL OF DEVICES AS DIRECTED BY THE ENGINEER.

THE FOLLOWING GENERAL NOTES APPLY AT ALL TIMES FOR THE DURATION OF THE CONSTRUCTION PROJECT EXCEPT WHEN OTHERWISE NOTED IN THE PLAN OR DIRECTED BY THE ENGINEER.

TRAFFIC PATTERN ALTERATIONS

- A) NOTIFY THE ENGINEER, COUNTY EMS, AND COUNTY SCHOOL OFFICIALS THIRTY (30) CALENDAR DAYS PRIOR TO ANY TRAFFIC PATTERN ALTERATION.

SIGNING

- B) INSTALL ADVANCE WORK ZONE WARNING SIGNS WHEN WORK IS WITHIN 40 FT FROM THE EDGE OF TRAVEL LANE AND NO MORE THAN THREE (3) DAYS PRIOR TO THE BEGINNING OF CONSTRUCTION.
- C) PROVIDE SIGNING AND DEVICES REQUIRED TO CLOSE THE ROAD ACCORDING TO THE ROADWAY STANDARD DRAWINGS AND TRAFFIC CONTROL PLANS.
PROVIDE SIGNING REQUIRED FOR THE OFF-SITE DETOUR ROUTE AS SHOWN IN THE TRAFFIC CONTROL PLANS.
- D) COVER OR REMOVE ALL SIGNS AND DEVICES REQUIRED TO CLOSE THE ROAD WHEN ROAD CLOSURE IS NOT IN OPERATION.

COVER OR REMOVE ALL SIGNS REQUIRED FOR THE OFF-SITE DETOUR WHEN THE DETOUR IS NOT IN OPERATION.
- E) ENSURE ALL NECESSARY SIGNING IS IN PLACE PRIOR TO ALTERING ANY TRAFFIC PATTERN.

TRAFFIC CONTROL DEVICES

- F) PLACE TYPE III BARRICADES WITH "ROAD CLOSED" SIGN R11-2 ATTACHED, OF SUFFICIENT LENGTH TO CLOSE ENTIRE ROADWAY.

PHASING

NOTE: BEFORE BEGINNING CONSTRUCTION THE CONTRACTOR SHALL PLACE ADVANCE WORK ZONE WARNING SIGNS ALONG MAUNEY RD., (SEE RSD 1101.01, SHEET 3 OF 3)

- STEP 1) USING ROADWAY STD. DRAWING 1101.03, SHEET 1 OF 9, CLOSE MAUNEY RD. (SR 2625) AND DETOUR TRAFFIC OFF-SITE AS SHOWN ON TMP-3.
- STEP 2) REMOVE THE EXISTING STRUCTURE.
- STEP 3) CONSTRUCT THE PROPOSED STRUCTURE AND ROADWAY
- STEP 4) PLACE FINAL PAVEMENT MARKINGS ACCORDING TO THE FINAL PAVEMENT MARKING PLANS.
- STEP 5) REMOVE ALL WORK ZONE TRAFFIC CONTROL DEVICES AND SIGNING. OPEN MAUNEY RD. (SR 2625) AND PLACE TRAFFIC ONTO THE FINAL PATTERN.

28-DC1-2025 11:33
 M:\2016\221601946\08 NCDOT Div 10 LIBR\221601946\08C_17BP10.R108_Bridge 292\TrafficControl\TCP\Bridg_292_TC_TMP_01B.dgn
 \$\$\$USERNAME\$\$\$

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



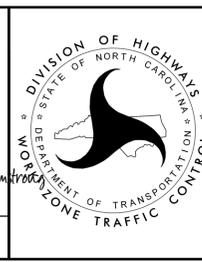
KCI ASSOCIATES OF N.C., P.A.
 4500 Falls of Neuse Road, Suite 200
 Raleigh, NC 27609-6270
 Phone (919) 783-9214
 NC Firm License No. C-4764

APPROVED: _____
 DATE: _____

SEAL



**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



**TRANSPORTATION
OPERATIONS
PLAN**

PROJ. REFERENCE NO.	SHEET NO.
BP10-R055	TMP-2

SP-1

<p>SIGN NUMBER: SP-1 BACKG COLOR: Fluorescent Orange</p> <p>TYPE: D COPY COLOR: Black</p> <p>QUANTITY: SEE PLANS</p> <p>SIGN WIDTH: 3'-0" HEIGHT: 2'-0" TOTAL AREA: 6.0 Sq.Ft.</p> <p>BORDER TYPE: RECESSED RECESS: 0.38" WIDTH: 0.63" RADII: 1.50"</p> <p>NO. Z BARS: N/A MAT'L: 0.080" ALUMINUM LENGTH: N/A</p>	<p>DESIGN BY: AH CHECKED BY: BS DATE: Aug 13, 2019</p> <p>PROJECT ID: BP10-R055 DIV: 10</p> <div style="text-align: center;"> </div> <p style="text-align: right;">Spacing Factor is 1 unless specified otherwise</p>																																																																		
<p>USE NOTES: 1,2</p> <p>1. Legend and border shall be direct applied black non-reflective sheeting.</p> <p>2. Background shall be NC GRADE B fluorescent orange retroreflective sheeting.</p>																																																																			
<p>LETTER POSITIONS</p> <table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th colspan="10">Letter spacings are to start of next letter</th> <th>Series/Size</th> </tr> <tr> <th colspan="10"></th> <th>Text Length</th> </tr> </thead> <tbody> <tr> <td></td><td>M</td><td>A</td><td>U</td><td>N</td><td>E</td><td>Y</td><td></td><td></td><td></td><td>C 2000</td> </tr> <tr> <td>7.09</td><td>4.08</td><td>3.97</td><td>3.79</td><td>3.79</td><td>3.06</td><td>3.13</td><td>7.09</td><td></td><td></td><td>21.82</td> </tr> <tr> <td></td><td>R</td><td>D</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td>C 2000</td> </tr> <tr> <td>14.74</td><td>3.79</td><td>2.73</td><td>14.74</td><td></td><td></td><td></td><td></td><td></td><td></td><td>6.52</td> </tr> </tbody> </table>		Letter spacings are to start of next letter										Series/Size											Text Length		M	A	U	N	E	Y				C 2000	7.09	4.08	3.97	3.79	3.79	3.06	3.13	7.09			21.82		R	D								C 2000	14.74	3.79	2.73	14.74							6.52
Letter spacings are to start of next letter										Series/Size																																																									
										Text Length																																																									
	M	A	U	N	E	Y				C 2000																																																									
7.09	4.08	3.97	3.79	3.79	3.06	3.13	7.09			21.82																																																									
	R	D								C 2000																																																									
14.74	3.79	2.73	14.74							6.52																																																									
<p>FILENAME: B-120292 DETOUR SIGN FACE LAYOUT NORTH CAROLINA D.O.T. SIGN DETAIL</p>																																																																			

29-SEP-2025 15:45
 M:\2016\221601946\08 NCDOT Div 10 LIBR\221601946\08C_17BP10.R108_Bridge 292\Traffic\TrafficControl\TOP\Bridg\292_TC_TMP_02.dgn
 \$\$\$USERNAME\$\$\$

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**

KCI
 KCI ASSOCIATES OF N.C., P.A.
 4800 Falls of Neuse Road, Suite 200
 Raleigh, NC 27609-6270
 Phone (919) 783-9214
 NC Firm License No: C-0764

APPROVED: _____

DATE: _____

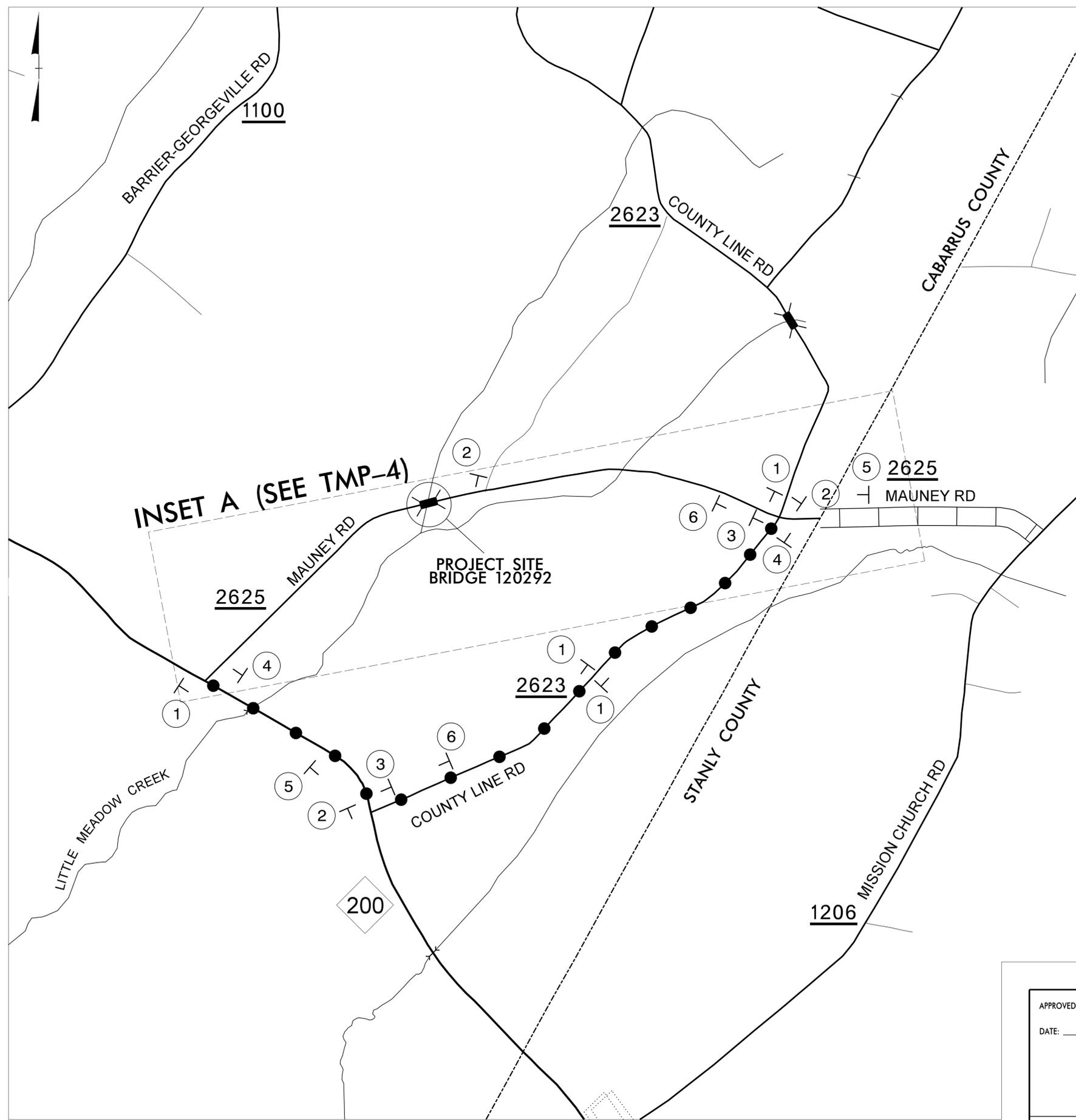
SEAL

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**

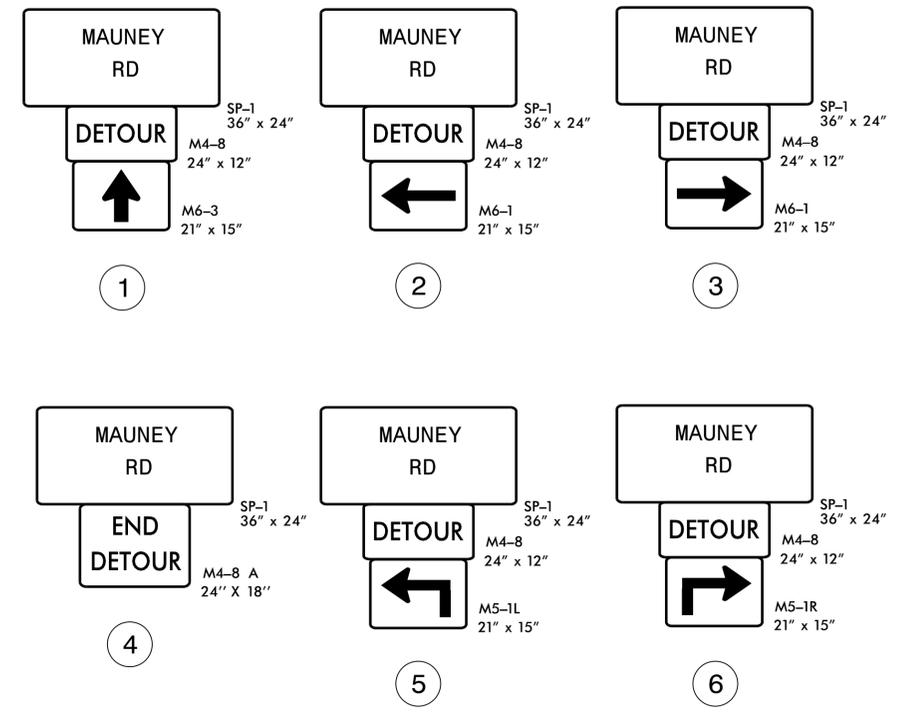


**SPECIAL SIGN
DESIGN**

29-SEP-2025 15:45
 M:\2016\221601946\08 NCDOT Div 10 LIBR\221601946\08C_17BP10.R108_Bridge 292\TrafficControl\TCP\Bridg_292_TC_TMP_03.dgn
 \$\$\$USERNAME\$\$\$



BRIDGE 120292	PROJ. REFERENCE NO. BP10-R055	SHEET NO. TMP-3
---------------	----------------------------------	--------------------



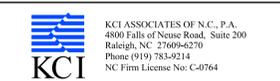
NOTES:

- REFER TO ROADWAY STANDARD DRAWING 1101.03, SHEET 1 OF 9 FOR APPLICABLE NOTES.
- ALL SIGN SPACING DIMENSIONS ARE APPROXIMATE. FIELD ADJUST AS NECESSARY OR AS DIRECTED BY THE ENGINEER.
- SEE SHEET TMP-2 FOR THE SPECIAL SIGN DESIGN.
- ALL DETOUR SIGN LOCATIONS ARE APPROXIMATE.
- PLACE SIGNS 5 & 6 500 FEET FROM INTERSECTION.

DETOUR ROUTE

 APPROX. 2 MILES

**DOCUMENT NOT CONSIDERED FINAL
 UNLESS ALL SIGNATURES COMPLETED**



APPROVED: _____
 DATE: _____

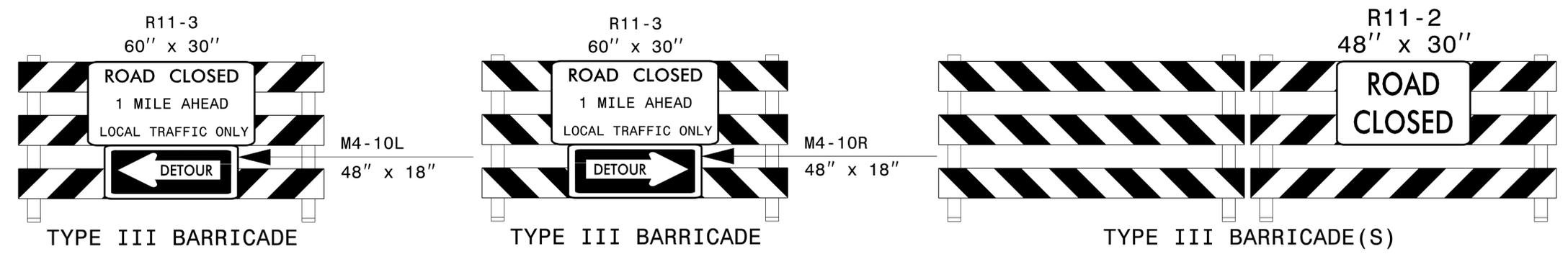
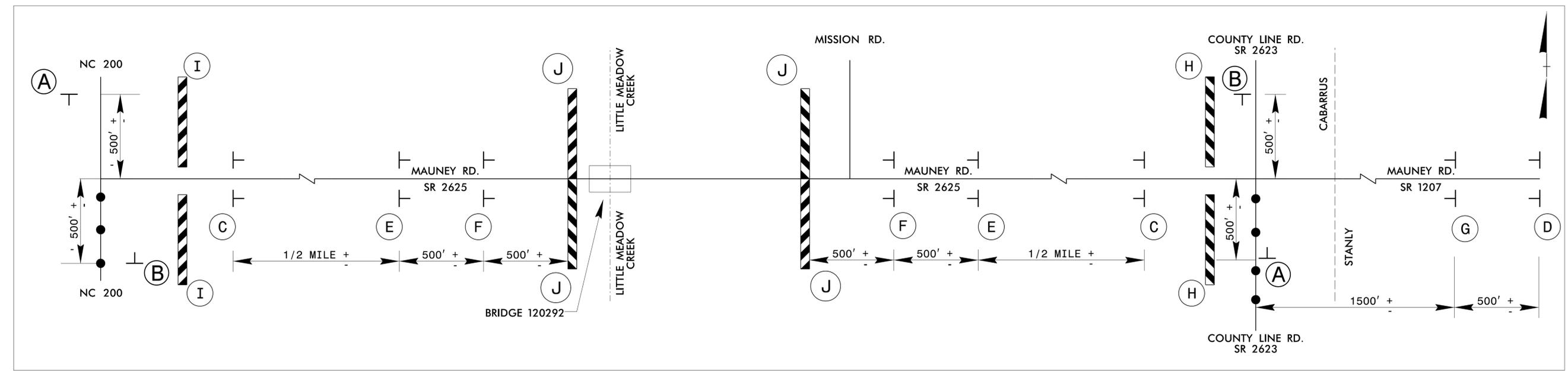
SEAL

**DOCUMENT NOT CONSIDERED FINAL
 UNLESS ALL SIGNATURES COMPLETED**



OFFSITE DETOUR

INSET A



NOTES:

1. REFER TO ROADWAY STANDARD DRAWING 1101.03, SHEET 1 OF 9 FOR APPLICABLE NOTES.
2. ALL SIGN SPACING DIMENSIONS ARE APPROXIMATE. FIELD ADJUST AS NECESSARY OR AS DIRECTED BY THE ENGINEER.
3. SEE SHEET TMP-2 FOR THE SPECIAL SIGN DESIGN.
4. ALL DETOUR SIGN LOCATIONS ARE APPROXIMATE.

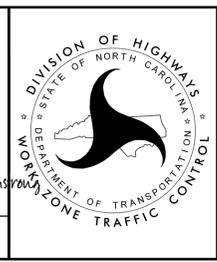
**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**

KCI ASSOCIATES OF N.C., P.A.
4800 Falls of Neuse Road, Suite 200
Raleigh, NC 27609-6270
Phone (919) 783-9214
NC Firm License No: C-0764

APPROVED: _____
DATE: _____

SEAL

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



OFFSITE DETOUR
(INSET A)

29-SEP-2025 15:45 M:\2016\2216101946_08 NCDOT Div 10 LIBR\2216101946_08C_17BP10.R108_Bridge 292\TrafficControl\TC\Bridg_292_TC_TMP_04.dgn \$\$\$USERNAME\$\$\$

PROJECT REFERENCE NO. <i>BPI0-R055</i>	SHEET NO. <i>PMP-1</i>
APPROVED: _____	
DATE: _____	
SEAL: 	
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED	
	KCI ASSOCIATES OF N.C., P.A. 4800 Falls of Neuse Road, Suite 200 Raleigh, NC 27609 Phone (919) 783-9214 NC Firm License No: C-0764

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

PAVEMENT MARKING PLAN

CABARRUS COUNTY

**LOCATION: BRIDGE No. 120292 OVER LITTLE
MEADOW CREEK ON SR 2625 (MAUNEY RD.)**

PROJECT: BPI0-R055

CONTRACT: DJ00585

ROADWAY STANDARD DRAWING

THE FOLLOWING ROADWAY STANDARDS AS APPEAR IN "ROADWAY STANDARD DRAWINGS" - N.C. DEPARTMENT OF TRANSPORTATION - RALEIGH, N.C., DATED JANUARY 2024 ARE APPLICABLE TO THIS PROJECT AND BY REFERENCE HEREBY ARE CONSIDERED A PART OF THESE PLANS:

STD. NO.	TITLE
1205.01	PAVEMENT MARKINGS - LINE TYPES AND OFFSETS
1205.02	PAVEMENT MARKINGS - TWO-LANE AND MULTI-LANE ROADWAYS
1205.12	PAVEMENT MARKINGS - BRIDGES
1261.01	GUARDRAIL AND BARRIER DELINEATORS - INSTALLATION SPACING
1261.02	GUARDRAIL & BARRIER DELINEATORS - TYPES AND MOUNTING
1262.01	GUARDRAIL END DELINEATION

GENERAL NOTES

THE FOLLOWING GENERAL NOTES APPLY AT ALL TIMES FOR THE DURATION OF THE CONSTRUCTION PROJECT, EXCEPT WHEN OTHERWISE NOTED IN THE PLAN, OR DIRECTED BY THE ENGINEER.

- A) INSTALL PAVEMENT MARKINGS AND PAVEMENT MARKERS ON THE FINAL SURFACE AS FOLLOWS:

ROAD NAME	MARKING	MARKER
SR 2625 (MAUNEY RD.)	THERMOPLASTIC	NONE
- B) TIE PROPOSED PAVEMENT MARKING LINES TO EXISTING PAVEMENT MARKING LINES.
- C) REMOVE/REPLACE ANY CONFLICTING/DAMAGED PAVEMENT MARKINGS AND MARKERS.
- D) PASSING ZONES WILL BE DETERMINED IN THE FIELD AND MUST BE APPROVED BY THE ENGINEER.

PAVEMENT MARKING SCHEDULE

SYMB	DESCRIPTION	FINAL PAVEMENT MARKING
T1	THERMOPLASTIC (4", 90 MIL) WHITE EDGELINE	
T13	THERMOPLASTIC (4", 90 MIL) YELLOW DOUBLE CENTER	

INDEX

SHEET NO.	DESCRIPTION
PMP-1	PAVEMENT MARKING PLAN TITLE AND SCHEDULE SHEET
PMP-2	PAVEMENT MARKING DETAIL

KELVIN L. JORDAN SIGNING & DELINEATION REGIONAL ENGINEER

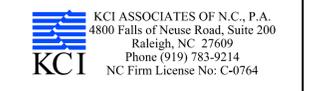
RENEE B. ROACH, PE, CPM STATE SIGNING & DELINEATION ENGINEER



PLANS PREPARED BY:

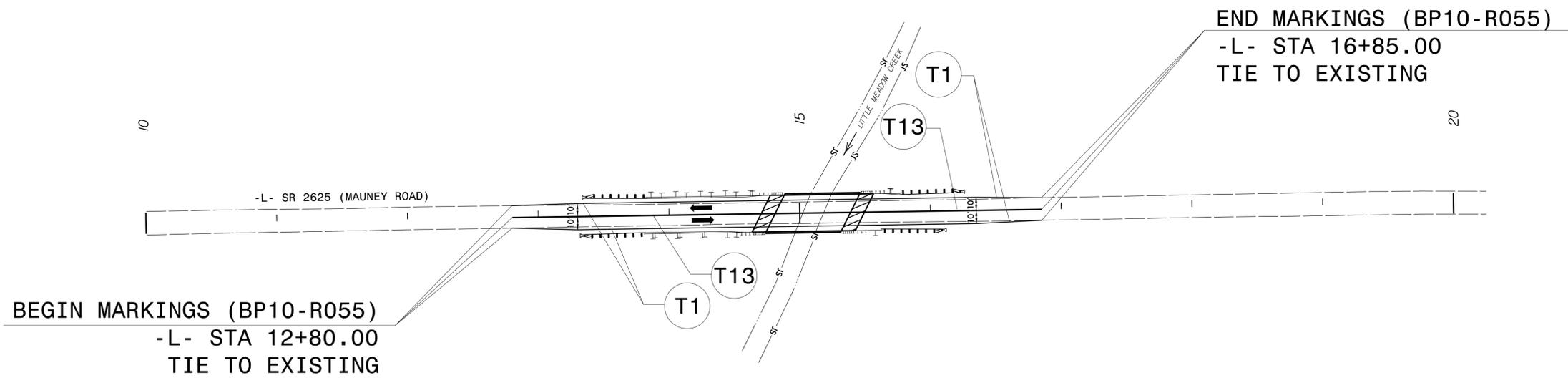
ROBERT F. DECOLA, P.E. KCI PROJECT MANAGER

MATTHEW G. ARMSTRONG, P.E. KCI PROJECT DESIGN ENGINEER



29-SEP-2025 15:23
M:\2016\2216101946_08 NCDOT Div 10 LIBR\2216101946_08C_17BP_10_R_108_Bridge 292\Traffic\Pavement Markings\7BP_10_R_108_BrIdge 292_PMP_01.dgn
\$\$\$\$\$USERNAME\$\$\$\$\$

PROJECT REFERENCE NO. <i>BP10-R055</i>	SHEET NO. <i>PMP-2</i>
APPROVED: _____	
DATE: _____	
SEAL:	
	
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED	
	
<small>KCI ASSOCIATES OF N.C., P.A. 4800 Falls of Neuse Road, Suite 200 Raleigh, NC 27609-6270 Phone (919) 783-9214 NC Firm License No. C-0764</small>	

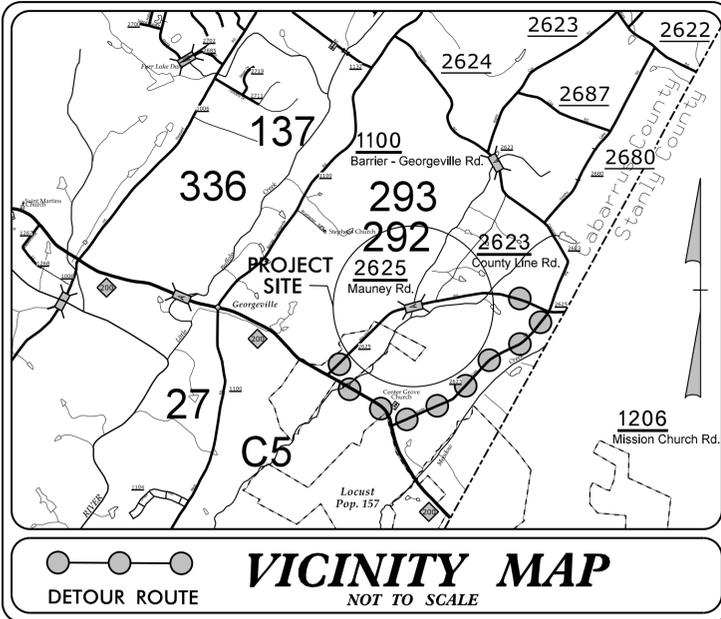


PAVEMENT MARKING LEGEND	
(T1)	WHITE EDGELINE (4", 90 MIL)
(T13)	YELLOW DOUBLE CENTER (4", 90 MIL)

PAVEMENT MARKING DETAIL

01-OCT-2025 14:14
 M:\2016\221601946.08 NCDOT Div 10 LIBR\221601946.08C.17BP.10.R.108_Bridge 292_Traffic\Pavement Markings\17BP.10.R.108_Bridge 292_PMP_02.dgn
 \$\$\$USERNAME\$\$\$

TIP PROJECT: BP10-R055



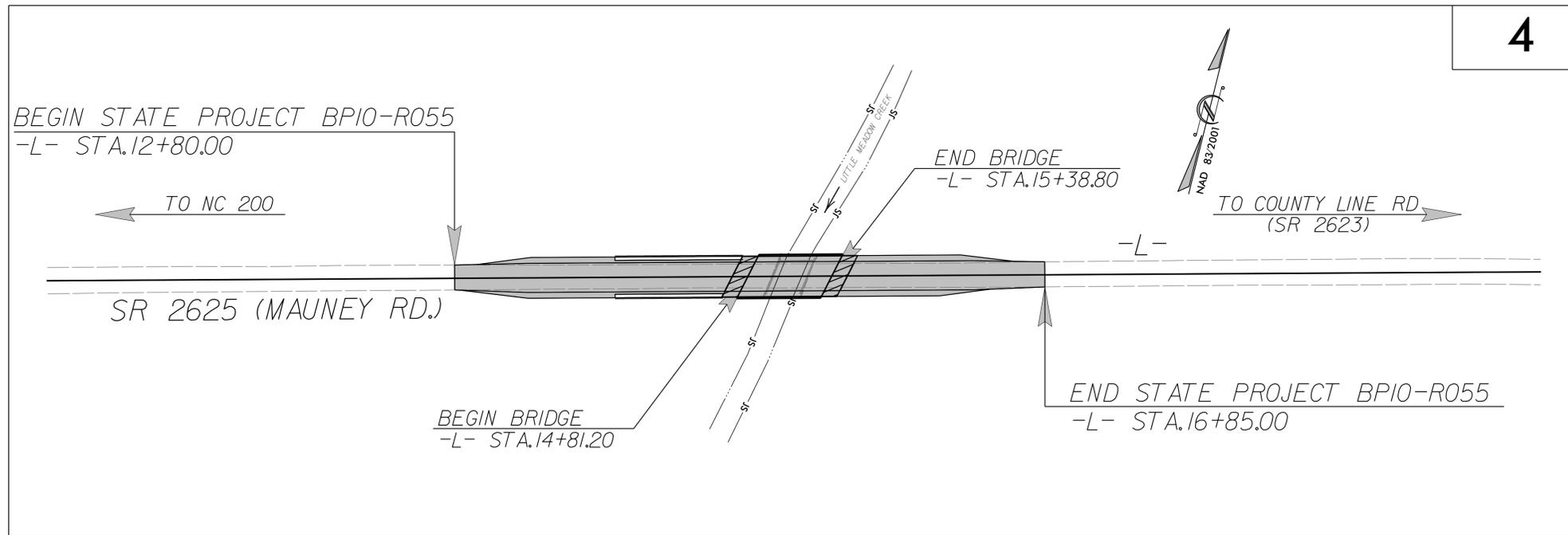
STATE OF NORTH CAROLINA
 DIVISION OF HIGHWAYS
 PLAN FOR PROPOSED
 HIGHWAY EROSION CONTROL
CABARRUS COUNTY

STATE	STATE PROJECT REFERENCE NO.	SHEET NO.	TOTAL SHEETS
N.C.	BP10-R055	EC-1	
STATE PROJ. NO.	F.A. PROJ. NO.	DESCRIPTION	
BP10.R055.1	N/A	PE	
BP10.R055.2	N/A	R/W & UTIL.	
BP10.R055.3	N/A	CONST.	

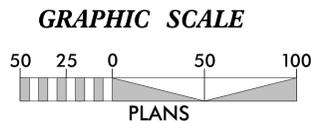


LOCATION: REPLACE BRIDGE NO. 120292 OVER LITTLE MEADOW CREEK ON SR 2625 (MAUNEY RD.)

TYPE OF WORK: GRADING, PAVING, DRAINAGE AND STRUCTURE



THIS PROJECT CONTAINS EROSION CONTROL PLANS FOR CLEARING AND GRUBBING PHASE OF CONSTRUCTION.



THESE EROSION AND SEDIMENT CONTROL PLANS COMPLY WITH THE REGULATIONS SET FORTH BY THE NCG 010000 GENERAL STORMWATER PERMIT ISSUED BY THE NORTH CAROLINA DEPARTMENT OF ENVIRONMENTAL QUALITY DIVISION OF ENERGY, MINERAL, AND LAND RESOURCES.

Prepared In the Office of:
SUNGATE DESIGN GROUP, P.A.

905 JONES FRANKLIN ROAD
 RALEIGH, NORTH CAROLINA 27606
 TEL (919) 859-2243
 ENG FIRM LICENSE NO. C-890

SUNGATE DESIGN GROUP, P.A.
2024 STANDARD SPECIFICATIONS
 Designed by:
JAKE STANOVICH 4461
 NAME LEVEL III CERTIFICATION NO.

Roadway Standard Drawings

The "Roadway Standard Drawings"- Roadway Design Unit - N. C. Department of Transportation - Raleigh, N. C., dated January 2024 and the latest revision thereto are applicable to this project and by reference hereby are considered a part of these plans.

6/20/2025 08:58:10 EC_den_psh_01.dgn

DIVISION OF HIGHWAYS STATE OF NORTH CAROLINA

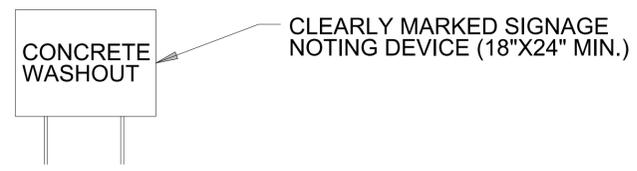
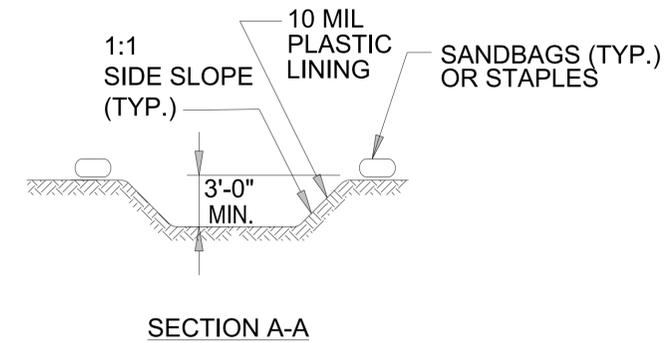
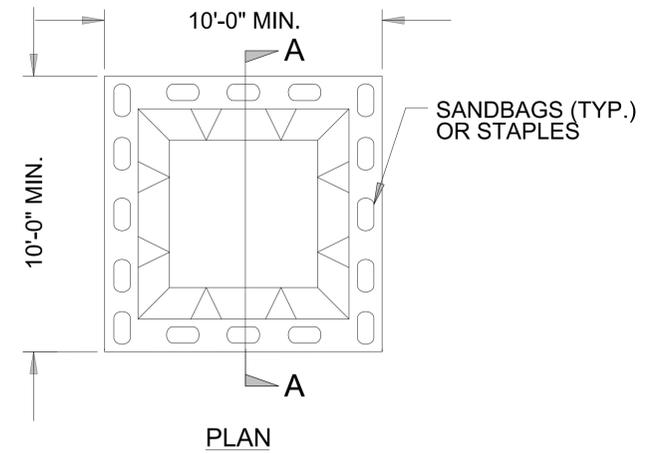
PROJECT REFERENCE NO. BP10-R055	SHEET NO. EC-02

EROSION & SEDIMENT CONTROL LEGEND

<u>Std. #</u>	<u>Description</u>	<u>Symbol</u>	<u>Std. #</u>	<u>Description</u>	<u>Symbol</u>
1605.01	Temporary Silt Fence		1633.01	Temporary Rock Silt Check Type A	
1606.01	Special Sediment Control Fence		1633.02	Temporary Rock Silt Check Type B	
1622.01	Temporary Berms and Slope Drains		1633.03	Temporary Rock Silt Check Type A with Excelsior Matting and Flocculant	
1630.02	Silt Basin Type B		1634.01	Temporary Rock Sediment Dam Type A	
1630.03	Temporary Silt Ditch		1634.02	Temporary Rock Sediment Dam Type B	
1630.04	Stilling Basin		1635.01	Rock Pipe Inlet Sediment Trap Type A	
1630.05	Temporary Diversion		1635.02	Rock Pipe Inlet Sediment Trap Type B	
1630.06	Special Stilling Basin		1636.01	Excelsior Wattle Check	
1630.07	Skimmer Basin		1636.01	Excelsior Wattle Check with Flocculant	
1630.08	Tiered Skimmer Basin		1636.01	Coir Fiber Wattle Check	
1630.09	Earthen Dam with Skimmer		1636.01	Coir Fiber Wattle Check with Flocculant	
	Infiltration Basin		1636.02	Silt Fence Excelsior Wattle Break	
	Rock Inlet Sediment Trap:			Silt Fence Coir Fiber Wattle Break	
1632.01	Type A		1636.02	Excelsior Wattle Barrier	
1632.02	Type B		1636.03	Coir Fiber Wattle Barrier	
1632.03	Type C				

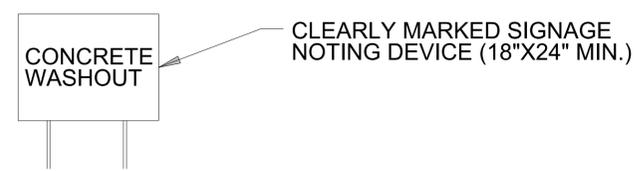
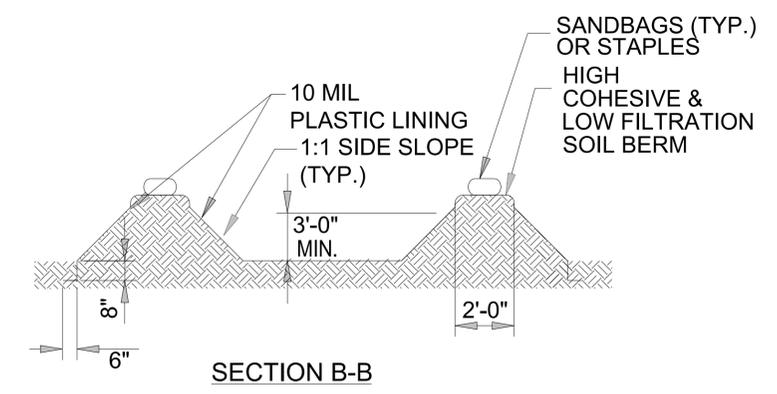
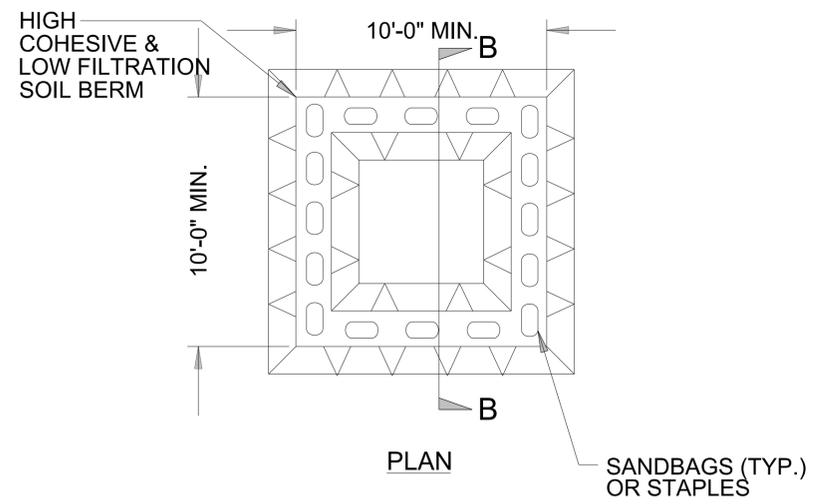
PROJECT REFERENCE NO. <i>BPI0-R055</i>	SHEET NO. <i>EC-2A</i>
RW SHEET NO.	

ONSITE CONCRETE WASHOUT STRUCTURE WITH LINER



BELOW GRADE WASHOUT STRUCTURE
NOT TO SCALE

- NOTES:**
1. ACTUAL LOCATION DETERMINED IN FIELD
 2. THE CONCRETE WASHOUT STRUCTURES SHALL BE MAINTAINED WHEN THE LIQUID AND/OR SOLID REACHES 75% OF THE STRUCTURES CAPACITY TO PROVIDE ADEQUATE HOLDING CAPACITY WITH A MINIMUM 12 INCHES OF FREEBOARD.
 3. CONCRETE WASHOUT STRUCTURE NEEDS TO BE CLEARLY MARKED WITH SIGNAGE NOTING DEVICE.



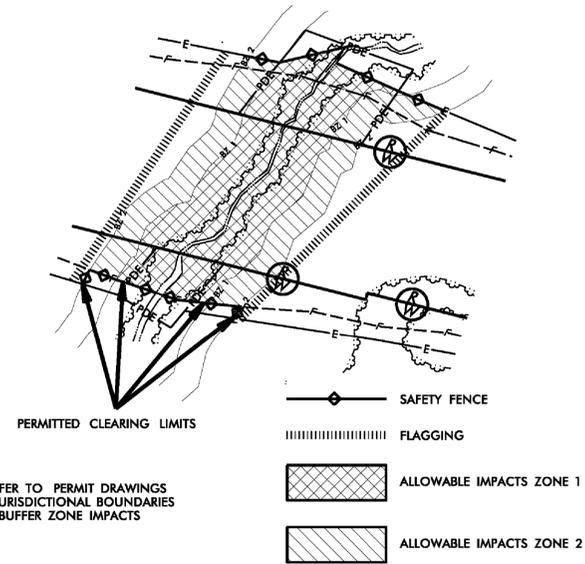
ABOVE GRADE WASHOUT STRUCTURE
NOT TO SCALE

- NOTES:**
1. ACTUAL LOCATION DETERMINED IN FIELD
 2. THE CONCRETE WASHOUT STRUCTURES SHALL BE MAINTAINED WHEN THE LIQUID AND/OR SOLID REACHES 75% OF THE STRUCTURES CAPACITY TO PROVIDE ADEQUATE HOLDING CAPACITY WITH A MINIMUM 12 INCHES OF FREEBOARD.
 3. CONCRETE WASHOUT STRUCTURE NEEDS TO BE CLEARLY MARKED WITH SIGNAGE NOTING DEVICE.

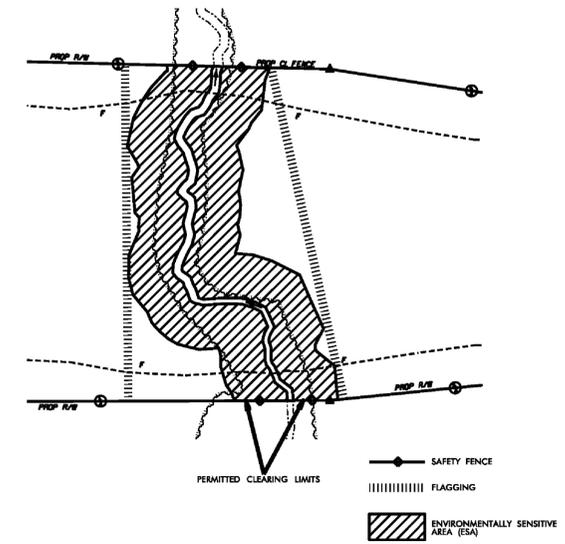
PROJECT REFERENCE NO.	SHEET NO.
BP10-R055	EC-2B
RW SHEET NO.	

SAFETY FENCE DETAILS

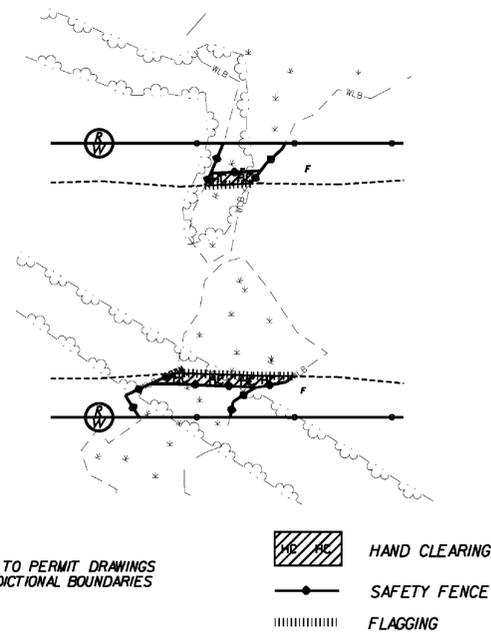
JURISDICTIONAL STREAM – RIPARIAN BUFFER ZONE*



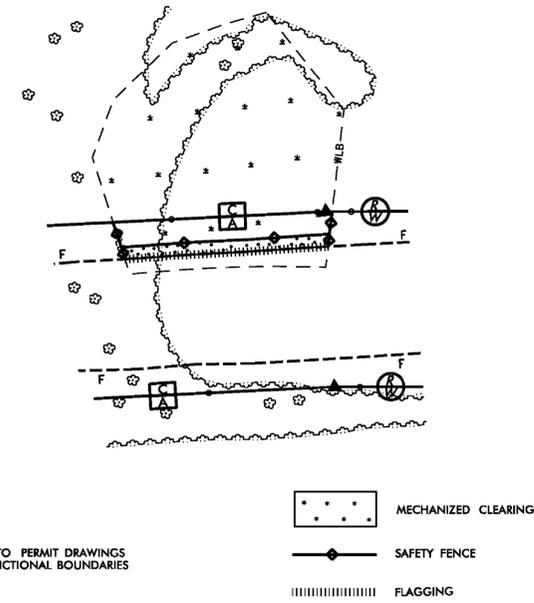
JURISDICTIONAL STREAM – ENVIRONMENTALLY SENSITIVE AREA (ESA) WITHOUT RIPARIAN BUFFERS



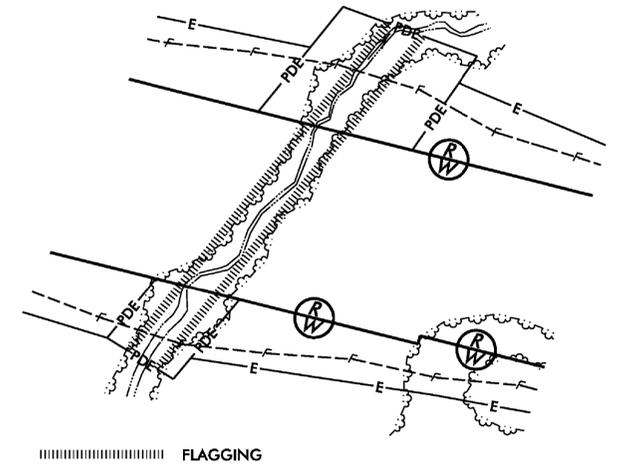
WETLAND – HAND CLEARING*



WETLAND – MECHANIZED CLEARING*



JURISDICTIONAL STREAM – NO HQW / NO BUFFER



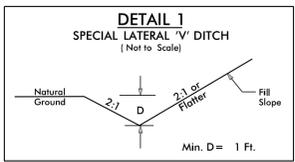
DIVISION OF HIGHWAYS
STATE OF NORTH CAROLINA

PROJECT REFERENCE NO.	SHEET NO.
<i>BPI0-R055</i>	<i>EC-3A</i>

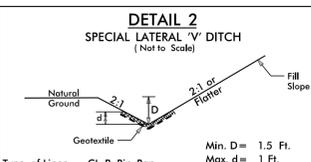
SOIL STABILIZATION TIMEFRAMES

<i>SITE DESCRIPTION</i>	<i>STABILIZATION TIME</i>	<i>TIMEFRAME EXCEPTIONS</i>
PERIMETER DIKES, SWALES, DITCHES AND SLOPES	7 DAYS	NONE
HIGH QUALITY WATER (HQW) ZONES	7 DAYS	NONE
SLOPES STEEPER THAN 3:1	7 DAYS	IF SLOPES ARE 10' OR LESS IN LENGTH AND ARE NOT STEEPER THAN 2:1, 14 DAYS ARE ALLOWED.
SLOPES 3:1 TO 4:1	14 DAYS	7 DAYS FOR SLOPES GREATER THAN 50' IN LENGTH WITH SLOPES STEEPER THAN 4:1. 7 DAYS FOR PERIMETER DIKES, SWALES, DITCHES PERIMETER SLOPES, AND HQW ZONES
ALL OTHER AREAS WITH SLOPES FLATTER THAN 4:1	14 DAYS	7 DAYS FOR PERIMETER DIKES, SWALES, DITCHES PERIMETER SLOPES, AND HQW ZONES

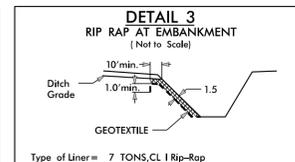
NAD 83/NAD 2011



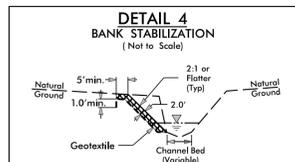
FROM STA. 12+80 TO STA. 14+90 -L- RT
FROM STA. 15+03 TO STA. 16+75 -L- RT



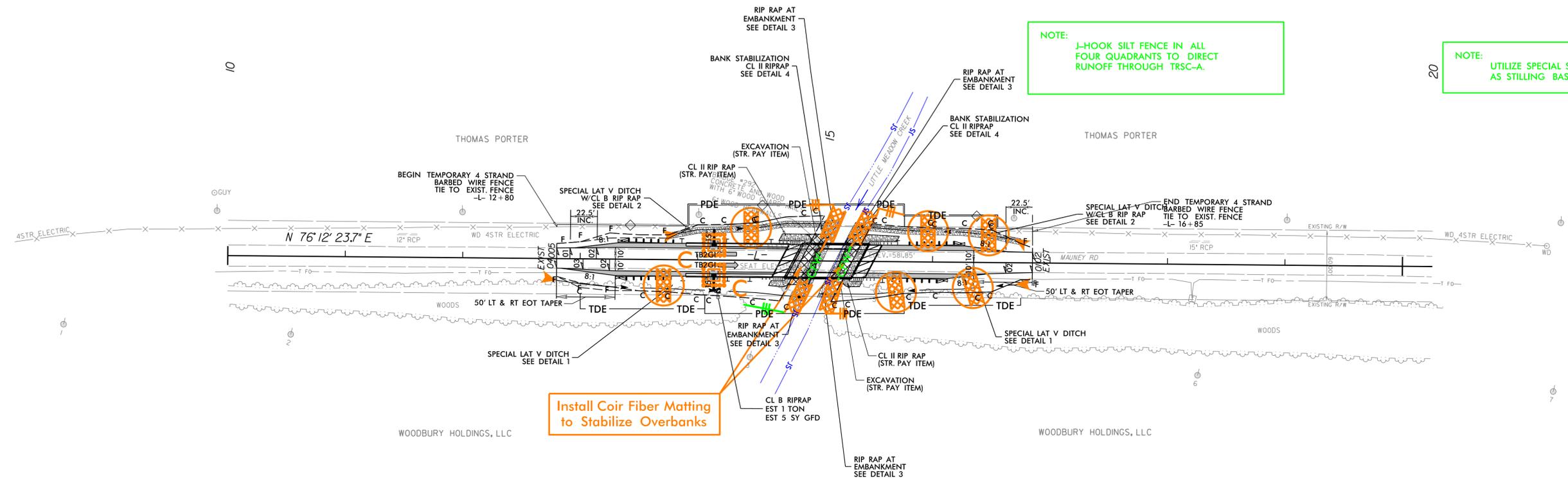
Type of Liner = CL B Rip-Rap
FROM STA. 13+75 TO STA. 15+17 -L- LT
FROM STA. 15+31 TO STA. 16+75 -L- LT



FROM STA. 14+80 TO STA. 14+90 -L- RT
FROM STA. 15+03 TO STA. 15+13 -L- RT
FROM STA. 15+07 TO STA. 15+17 -L- LT
FROM STA. 15+31 TO STA. 15+41 -L- LT



FROM STA. -L- 14+82 RT TO 15+18 LT
FROM STA. -L- 15+05 RT TO 15+39 LT



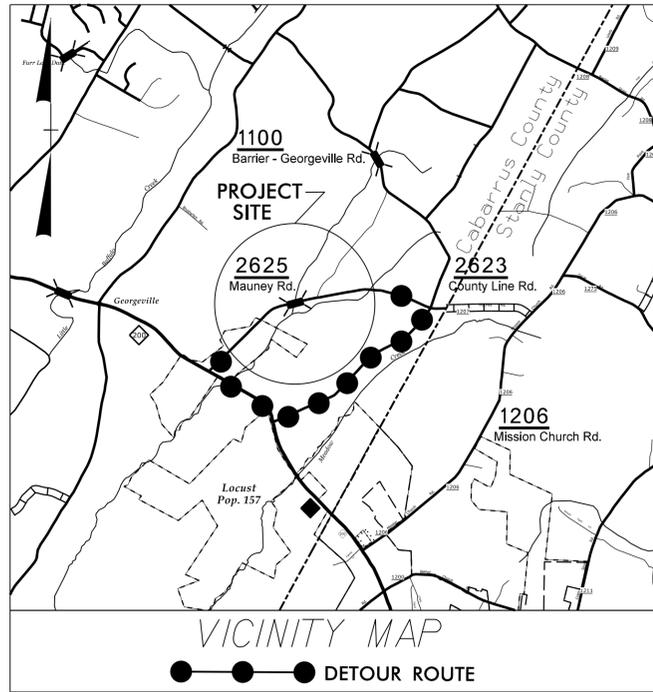
NOTE: J-HOOK SILT FENCE IN ALL FOUR QUADRANTS TO DIRECT RUNOFF THROUGH TRSC-A.

NOTE: UTILIZE SPECIAL STILLING BASIN(S) AS STILLING BASIN WHERE APPLICABLE.

Install Coir Fiber Matting to Stabilize Overbanks

09.08/99

STATE PROJECT:BP10-R055



FINAL PLANS

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

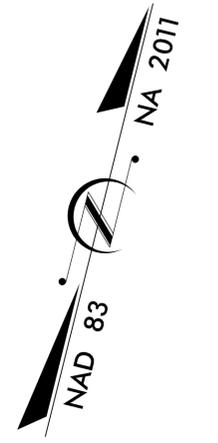
**UTILITIES BY OTHERS PLANS
CABARRUS COUNTY**

LOCATION: REPLACE BRIDGE NO. 120292 OVER LITTLE MEADOW CREEK ON SR 2625 (MAUNEY RD.)

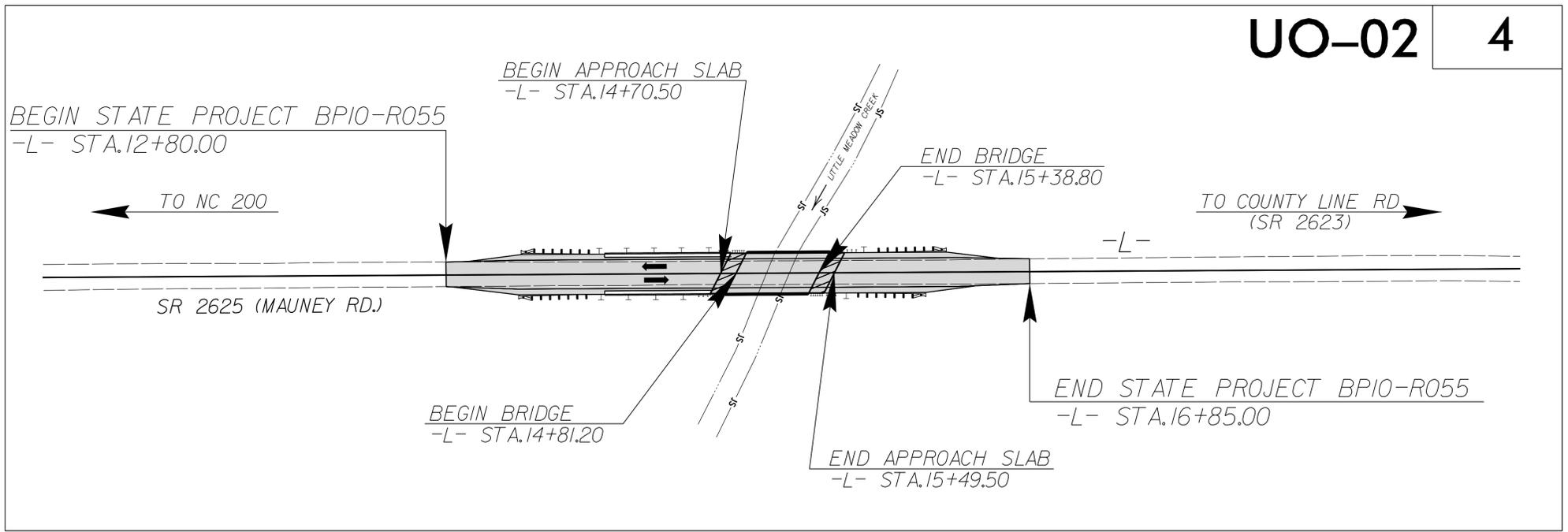
TYPE OF WORK: RELOCATION OF BURIED & AERIAL COMMUNICATION FACILITIES

T.I.P. NO.	SHEET NO.
BP10-R055	UO-1

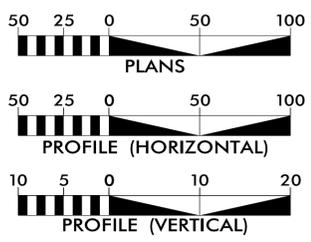
NOTE:
ALL UTILITY WORK SHOWN ON THIS SHEET WILL BE DONE BY OTHERS. NO PAYMENT WILL BE MADE TO THE CONTRACTOR FOR UTILITY WORK SHOWN ON THIS SHEET.



UO-02 4



GRAPHIC SCALES



INDEX OF SHEETS

SHEET NO.:	DESCRIPTION:
UO-1	TITLE SHEET
UO-02	UBO PLAN SHEET

UTILITY OWNERS WITH CONFLICTS

- (A) COMMUNICATIONS - WINDSTREAM
- (B) POWER - UNION POWER



PREPARED IN THE OFFICE OF:
KCI Associates of N.C., P.A.
4505 Falls of Neuse Road, Suite 400
Raleigh, NC 27609
Phone (919) 783-9214
Fax (919) 783-9266

JOHN FAISON UTILITY PROJECT MANAGER
DANIEL ALLEN PROJECT UTILITY DESIGNER



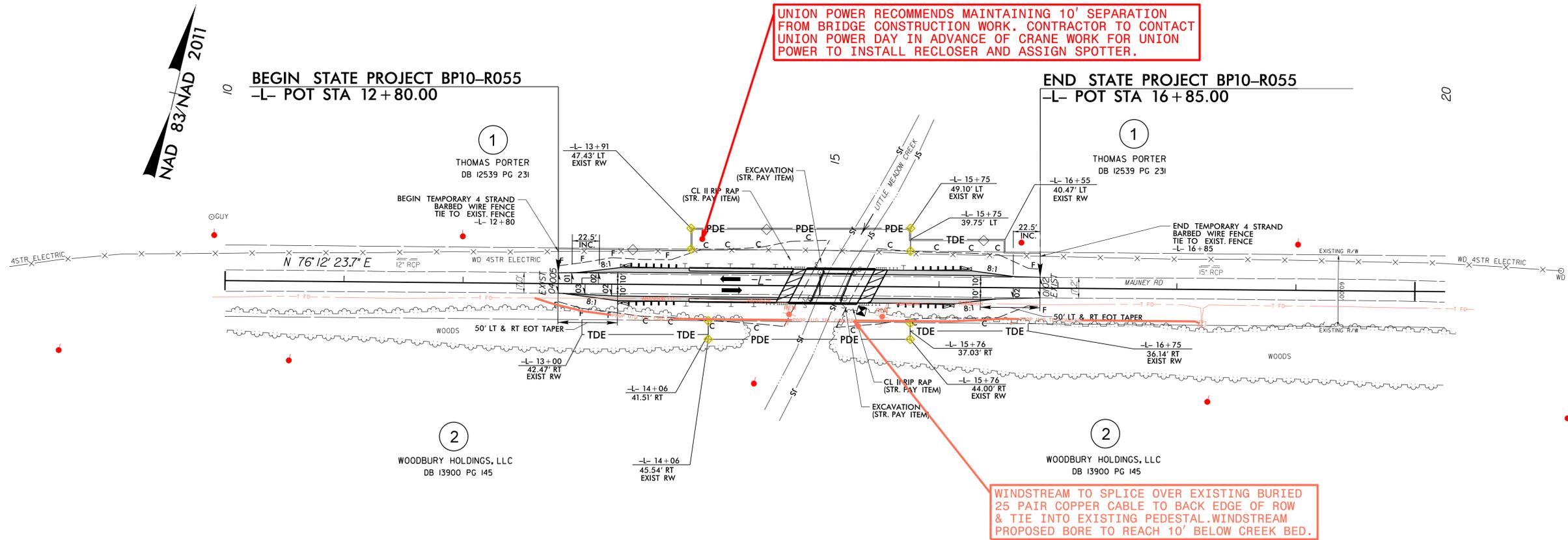
DIVISION OF HIGHWAYS
DIVISION 10
716 WEST MAIN ST.
ALBEMARLE, NC 28001

YANWEI MA, PE DIV. 10 BRIDGE PROGRAM MANAGER
DAVID TALBERT DIVISION UTILITY COORDINATOR

3:36:14 PM
290_000_B292_ut_tsh_u001_psh.dgn
Division:

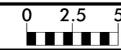
UTILITIES BY OTHERS

NOTE:
 ALL PROPOSED UTILITY WORK SHOWN ON THIS SHEET WILL BE DONE BY OTHERS. NO PAYMENT WILL BE MADE TO THE CONTRACTOR FOR PROPOSED UTILITY WORK SHOWN ON THIS SHEET.

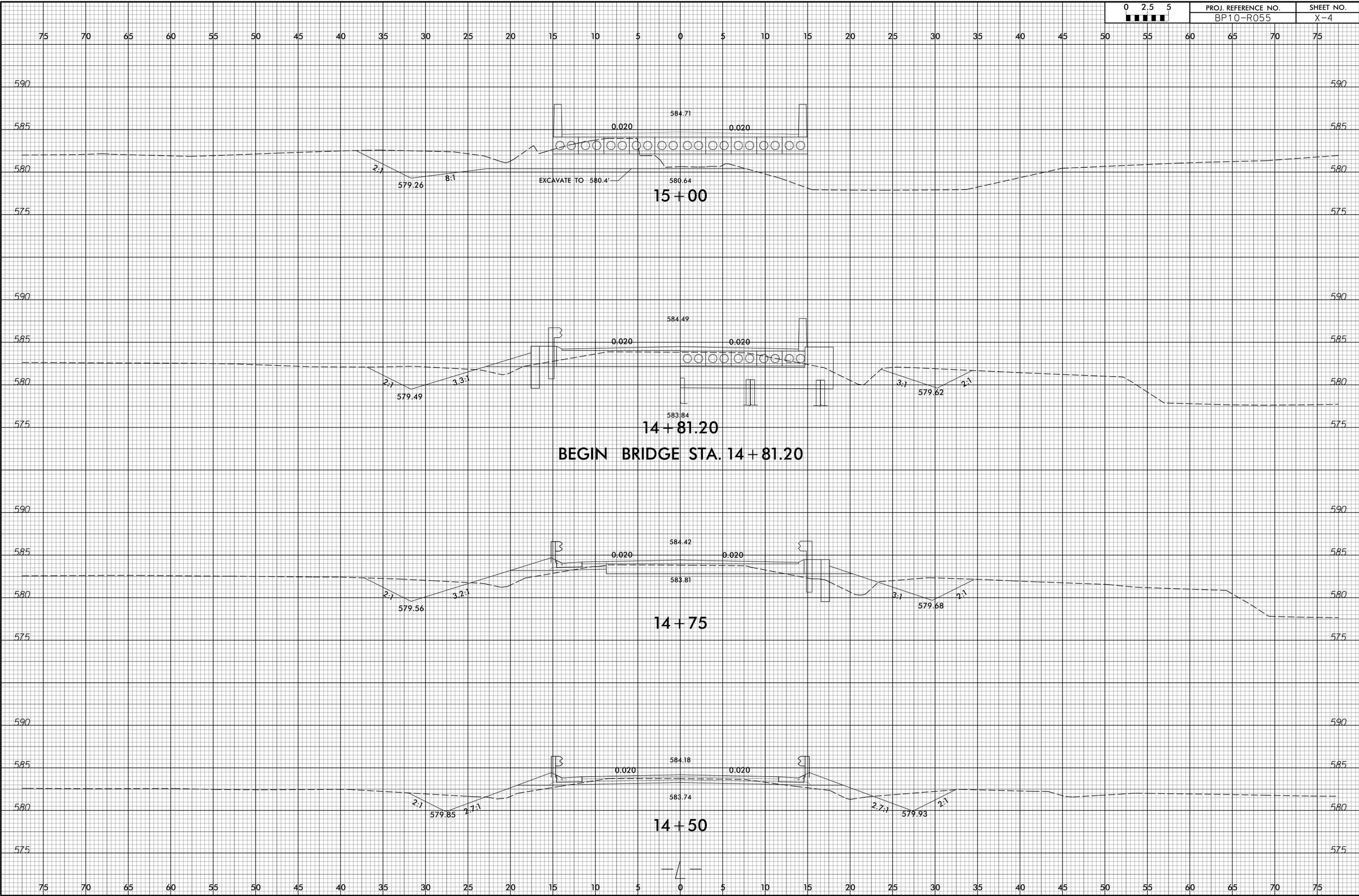


8/17/99
 8/17/99
 29 SEP 2005 15:45
 R:\2016\20160914\6.08 NCDOT Div 10 LIBR\221601946.08C_17BP_10.R.108_Bridge 292\Utilities\290.002.B292.ut_r.dwg.4_U002.psh.dgn
 \$\$\$\$ USERNAME\$\$\$\$

6/23/16

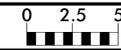


PROJ. REFERENCE NO.	SHEET NO.
BP10-R055	X-4

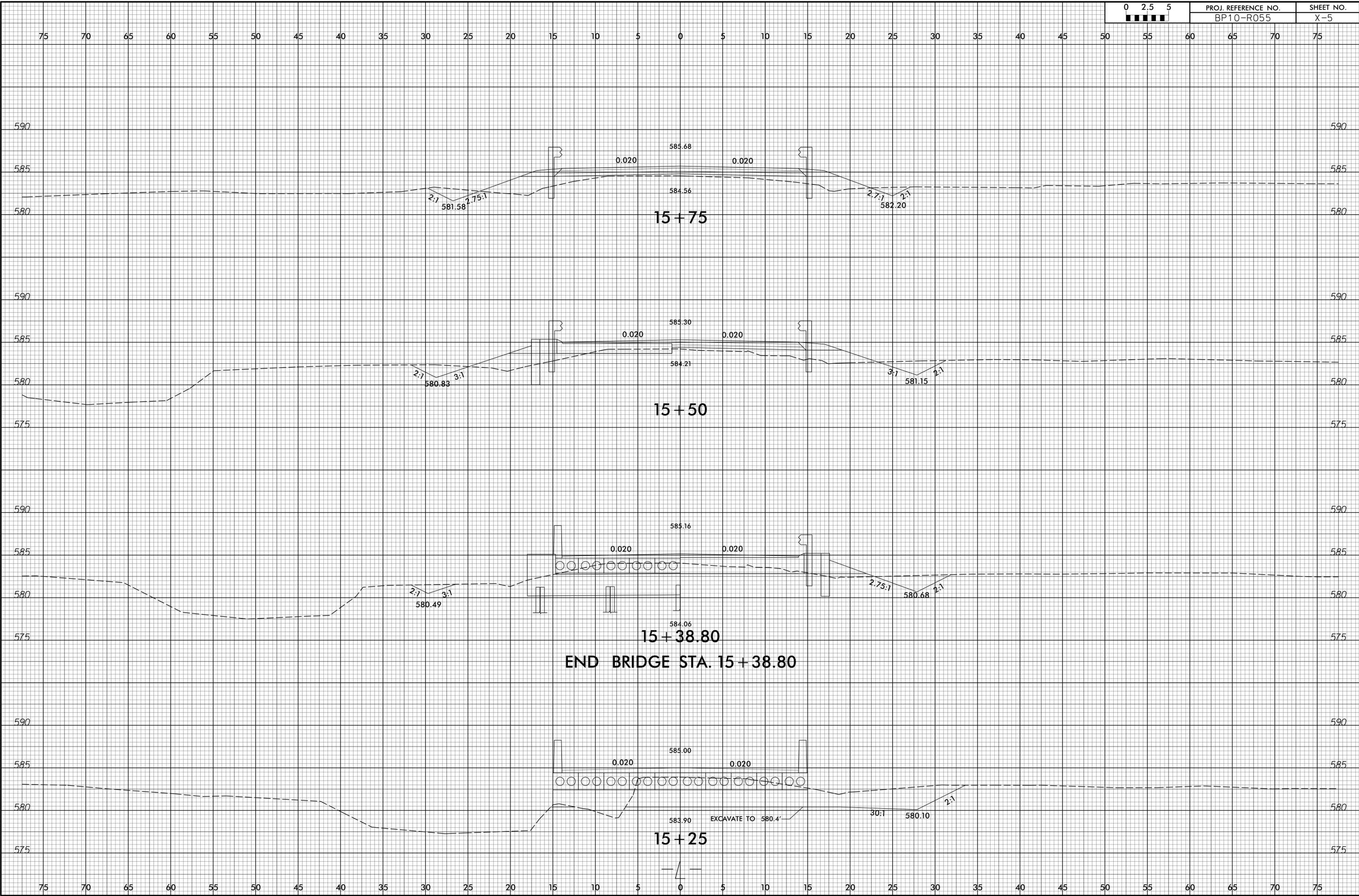


29-SEP-2025 15:06
 \\s015\201601946\08C-17BP-10-R-108 - Bridge 292\Roadway\CorridorModeling\292_Rdy.cm_xpl.L.dgn
 6/23/16 10:53:58 AM

6/23/16

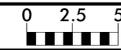


PROJ. REFERENCE NO.	SHEET NO.
BP10-R055	X-5



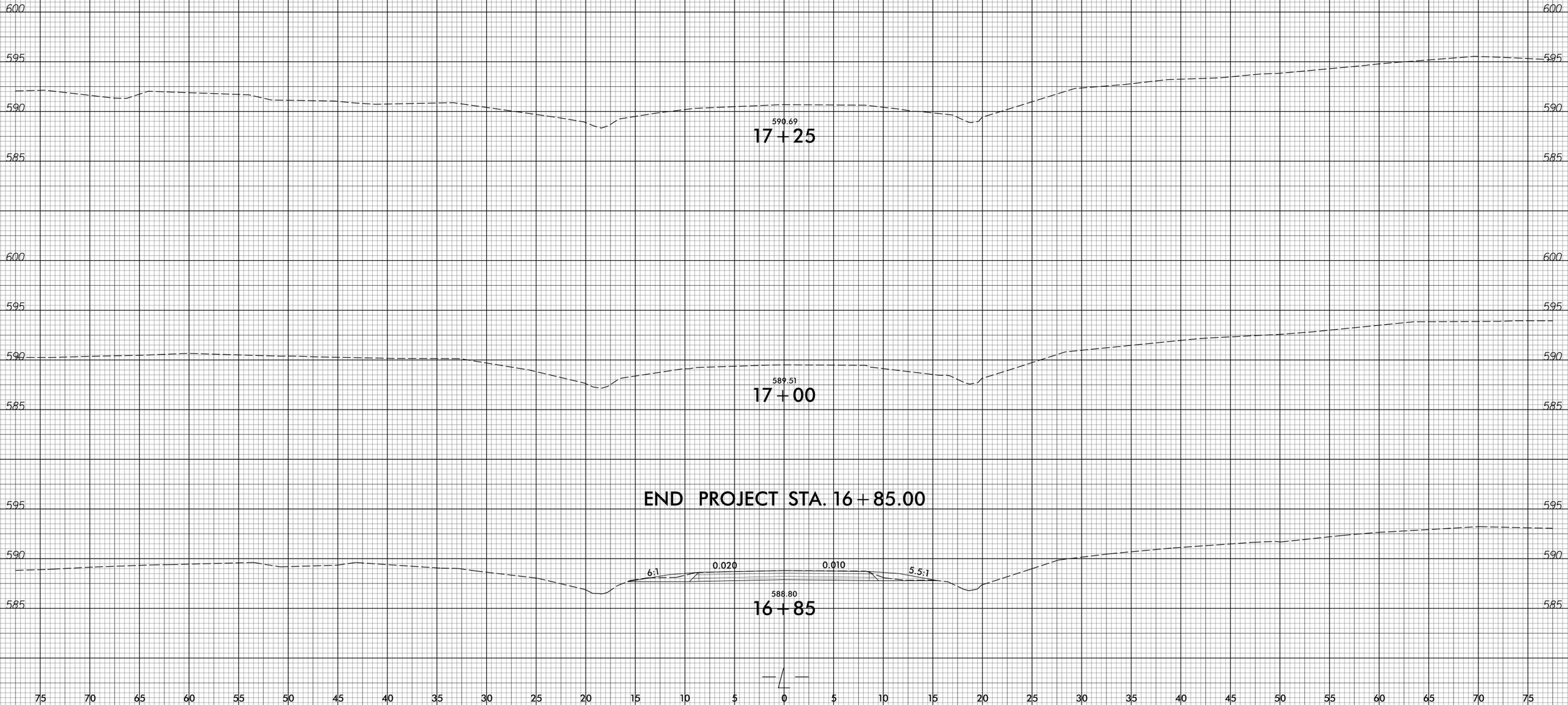
29-SEP-2025 15:06
 \\s01521601946\08C-17BP-10.R-108 - Bridge 292\Roadway\CorridorModeling\292_Rdy.cm_xpl.L.dgn
 6/23/16 10:53:58

6/23/16



PROJ. REFERENCE NO.	SHEET NO.
BP10-R055	X-7

75 70 65 60 55 50 45 40 35 30 25 20 15 10 5 0 5 10 15 20 25 30 35 40 45 50 55 60 65 70 75



29-SEP-2015 15:06
 C:\Users\jwheeler\OneDrive\Documents\292_Rdy.cm_xpl.dgn
 292_Rdy.cm_xpl.dgn
 292_Rdy.cm_xpl.dgn
 292_Rdy.cm_xpl.dgn

